

Wed. Sep 19 m  
and 20th

Cambridge, Mass -  
28 Aug. 1898 -



Respected Sir,

The interest which every student of Botany necessarily feels in the great work of which you have just issued the first part - & the perhaps natural desire to embody in it anything which his own observation has detected, is my only (though I trust it may be regarded a sufficient) excuse for obtruding upon you the following letter & its accompanying packet. I regret that the specimens are not better & more numerous - but if they are of value - this can be easily corrected. The *Rubus Cham-cemosus* - has not yet been identified with any particular locality (within my knowledge) & I have never seen any other habitat in the Books beside Pursh's. The plant is very abundant on the lower summit of the Wh. Mts - flowering in June & ripening its fruit about the 1<sup>st</sup> of Aug. The fruit is amber-colored - large - & almost unspiced - agreeing perfectly with the desc. in Eng. Botany. Having procured Bigelow's *Stellaria borealis* in what I supposed might be its orig. locality (at the base; for though Bigelow does not indicate this, I cannot think it is found at a much higher altitude - this base being estimated at about 1700 ft) I supposed the specimen might be useful in determining its identity with the sp. called *lanceolata* in your Flora - which point is made a doubtful one in Dr. Beck's Botany. The *Lobelia Dortmunda*, or what

I think may possibly be a constant variety of this sp. as represented in Eng. Bot., & as growing in the Pond in Cambridge — is plentiful in & around a small pond near the Notch — at about the elevation just mentioned. The characters of difference noted in about 50 fls were — smaller in all its parts, — flowers few, (2-3, rarely 4) corolla white. The latter char. is I know not entitled to this rank generally — & particularly in this genus — but in this case it appeared with the other marks — to constitute a ~~per~~ constant difference. The Lichenes (with the exc. of *Lecanora ventosa*, catalogued by Halsey, though evidently Alpine in this locality) have never been published in any work that I have seen as Amer<sup>n</sup> plants. They are all common on the summits. I have others of interest, & intend the following year to investigate the crustaceous alpine species.

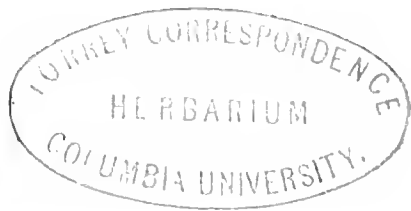
I have found two other plants of interest — which I cannot resist mentioning in this place. The one — *Corallorhiza multiflora* I found in damp woods at Montpelier Vt — flowering the last of July. — I believe it has not been published as a New-England plant. The other *Geaster quadrifidus* Pers — I can only find in Mr. Schweinitz's Synopsis with the remark 'nondum Pennsylvaniae.' It occurred in a sandy pine woods in Cambridge Mass — in company with what I suppose *G. hygrometricus*,

but much more rare - being (as Bryant states) kept out of sight  
by the firm hold of its radicles on the earth.

I hope Sir - I have not violated propriety in thus addressing  
you - still more that my observations may not be wholly  
without value - and with these I am most respectfully

Yours obt. servt.

Edward Tuckerman Junr



Prof. Torrey M  
New York City

[ *Ceanothus*  
*Stellaria ovalis* Big. Lake Champl.  
seems to be *C. Americanus*  
family uncertain -

*Stellaria borealis*. See Tag. No. 861

To / Professor Loney  
Esq  
New York City

Given 2. 10. ...  
H. A. - in company "



Recd. Nov. 6th



Cambridge  
4 Oct. 1830

Dear Sir

I feel deeply the privilege I enjoy in thus  
addressing you. The encouragement you <sup>have</sup> to kindly extended, has been  
the source of many an hour of pleasure — as I have contemplated  
the possibility of discoveries — which would be no longer doomed  
to the forgetfulness of some rubbish-corner in the Herbarium. And this  
hope has led me to write what I fear will be a tedious letter.  
So little (comparatively) has been published of the stations of American  
plants — that students often discover what the negative evidence of  
our books would make to appear rare — ~~but~~ while in fact the  
MSs of botanists & the great Herbariums of the Country are both supplied  
with the unprinted facts. I will mention several plants of interest —  
in regard to which I know only that they are not in my books. A plant  
is naturalized (recently) in Cambridge — which seems, though it was sent  
me in a <sup>badly</sup> dried state so that I could not examine the organs — to be the  
*Lysimachia nummularia* of Europe — & the comparison which I have just  
made of it with a Swiss specimen of the *L. nummularia* leads me to think  
it must be that plant — though I could not dissect the flowers of  
either with entire satisfaction. The *L. nummularia* has never been cultivated  
here to my knowledge — certainly not in our Botanical garden — & it is  
a plant which would hardly be cult. elsewhere. It is procumbent — or  
creeping I am not sure which — but this is hardly of consequence to you.

this sp. is recently & sparingly nat., but I see no reason why it should not continue.

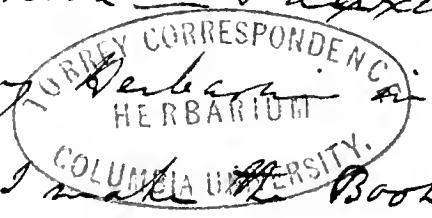
The *Salix* enclosed seems to be the herbacea of Ph. — whose sp. were from Labrador & I cannot find any notice of the plant in any other author. I found it very sparingly on the Northern summits of the White Mts. The other species mentioned in Eaton's Man. as found at the Wh. Mts by Dr. Boott is very common on the lower summits — not however growing with this.

The *Coralloshira* & *Geastrum* (though I called it *Geaster* for the reasons given by Mr. Berkeley in Hooker's Br. Fl. — it being the name applied by the creator of the genus) are my only specimens — though I hope to find the *Geastrum* again this fall. Most unfortunately the acuminate & conical orifice of the fruit-covering is wanting — being broken off when exhibited at the Boston Soc. Nat. Hist. — when I read some notices of the plant. These agreed almost perfectly — indeed as far as I went — with the obs. of Mr. Bryant — the author of a curious history of the English sp. of *Geaster* — published in pamphlet form about 1700: & I have no doubt that the reason he assigns for the rarity of the plant everywhere is equally true of ours. Unlike the other species about here — its fibrous radicles take firm hold of the earth & are buried even in the most exposed situations the plant is buried under the autumnal leaves of our forests. It seems to be an autumnal plant.

I also enclose a few lichens. The plant labelled *Nephroma* anon. seems to be new — & if so is a very interesting form of this genus. It grew

in deep patches on rocks on the side of Mt. Pleasant — in the Alpine regions.

You are kind enough to offer to send me exchange specimens. If what I have sent are of value — it will be most gratifying to me. I feel however that I can send little of any importance — & that your kind & instruction letters are as much as my observations really deserve. I will however mention the Cistaceae — as peculiarly interesting to me & of which almost any species that you can spare will be highly valued. There are a few in the Flora which I have not any means of obtaining here — though I believe they are not uncommon elsewhere. But do not allow my ignorance of the rarity of any of these sp. to trespass on your kindness. Until I have been able to communicate something of greater value than I have yet — I shall feel no claims & rest satisfied with what I have received already.

I have long had the first number of the Flora — & anxiously look for the second — as I am rearranging my  in accordance with the Method of the Flora: & by this plan I make the Book more familiar than in any other empirical way. — Since many years will elapse before I shall be able to study a plant & arrive at all its relations by the Natural Method — I am content to make an artificial arrangement to suit my own case. Botany is a Science: Though we did not know it under the guidance of Prof. Eaton, nor fully comprehend it under the brief review of Bech. Your great work — though it satisfies many a student of some standing in the old way — that he knows barely anything of Plants — will hardly discourage any who would do honor to Botany. — Though they find themselves — but on the threshold — yet the whole edifice

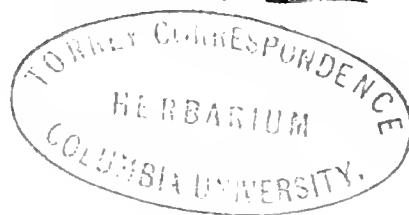
open fair upon the view — & they cannot mistake or lose the way. Still I  
think there are few of the few Botanical students about here — who will venture  
at present to go beyond Bigelow. I have shown the Prospects — but I do  
not know that any subscriptions have been yet made from Cambridge.

Pardon the irrelevancy of the latter part of this letter

I am with respect

Your humble servant Ed: Tuckerman Jun

Professor Torrey  
New York —

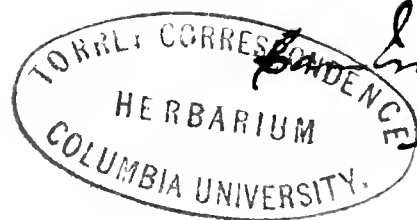


Professor Torrey  
New York

P.S. Allow me to ask how acceptable the Lichens were that I sent. Intending  
the next year to collect more thoroughly the lichens of the Mts. of Vt. & N.H. & particularly  
the crustaceous ones — I should like to know if the ground is one that has been already  
explored. Nothing has been published; but I believe that Schweinitz had very great  
collecting — whether American or not I do not know — I shall be proud to be of the  
least service in this respect, as I feel it is almost the only way that I can: — provided  
the Alpine lichens of our country have not been gathered already.

Edw. Tuckerm. <sup>man.</sup>

Am. Acad. Sci.



Bridge  
Mar. 1839-

Dear sir

I take the liberty again to send

you a few lichens, some of which I suppose of interest; though I shall be glad if you can firm my references to the systematic names, as the labour of ascertaining has had with me very little to alleviate it, and left to confirm and sanction its results. Scherer's invaluable work has however given the names some strength, so far as it went, & I am therefore willing to submit them to you, in the hope that if you have time to note any false references you will add to the kindness with which you received my former letter, by mentioning them.

I have sent a number, un-named, some of which I have long known by the what I suppose may be the correct names, but not having had it in my power to compare them with authentic specimens, ~~therefore~~ and knowing they would be equally valuable to you without the names, I have so sent them. These are numbered, answering to the specimens in my herb., so that if you will kindly note them

proper references, I shall esteem it an advantage far beyond any other return. As many of those, of which I wrote an account for the Boston Journal of Natural History, as I could, I have also sent, with the exception of 2 or 3 which I sent last year.

In addition to these I have sent in some other plants, of interest to me. 3 Marchantias. 1 Boletus versicolor. 2 Rhizomorpha<sup>in America?</sup> one of which so far as I am informed, is new to us; and the station, in a very old brick-spring-house on an old estate here, is one probably not often afforded. Sphaeria densa: This remarkable plant I have twice found at Cambridge & Brighton. But I regret exceedingly that the specimens are all somehow mislaid, so that I am as yet unable to put it in. And though I know nothing of any other Sphaeria, I believe I am right as to this, since it is a plant so remarkable & Withering's description & Greville's separation & establishment of it as a separate genus, leave very little to question. If I cannot send it now, I will as soon as possible. Lycopodium annotinum, L. This I have made out from the desert. & also from a comparison with authentic Swiss specimens of L. annotinum. It is the common Lycopodium on the lower summits of the White Mts. below L. selago, but far above L. lucidulum &c. & not leaving the Alpine track. I have been over these Mts twice with considerable care & feel familiar with the vegetation; and I cannot think what else can answer to the Lycopodium Sabinaefolium of Beck Bot. — which, to cut this short, it indeed may be. If it is, I hope you will excuse my prolixity about it. L. Selago: seems to prefer the highest summits



and occur among the rocks - at the very apex of the peak of Mt Washington, far above any other plant except mosses & lichens. This reminds me of a very remarkable assertion for a Botanist - & no less than Dr. Cutler, who is quoted in a book on Amer. Scenery now publishing by Mr. N. P. Willis in part, as saying that no vegetation whatever <sup>for</sup> <sup>on</sup> the peak of Mt. Washington but that "at the base of the summit the limits of vegetation may with propriety be fixed. There are indeed" he goes on "on some of the rocks, even to their apices, scattered specks of a mossy appearance; but I conceive them to be extraneous substances accidentally adhering to the rocks, for I could not discover, with any botanical microscope, any part of that plant regularly formed." Now not to speak of the abundant patches of *Carices* & *Diapensias* that occur on the sides of the peak, the rocks are perfectly heaped with perfect lichens, & the crevices are lined with perfect mosses, & as above-said, among these *Lycopodium Delago* frequently occurs to the very top. *Salix herbacea*; found by me very sparingly on a high ridge connecting the peak of Mt Washington with that of Mt Jefferson. I do not know that you got the other specimens (much better than this) which I sent with an account 12 long months since. I believe this is new. Having before I went on to these Mts studied the descr. & collected a list of all the Alpine plants that had been already found, it was my ambition to add one to this list - and since my *Rubus Chamaemorus* was too late, I hope this little shrub may be the happy one: provided it escaped the eagle-eye of Mr. Oakes. It has certainly never been published except by Pursh in this country. *Elatine Americana*, abundant in Can. l' on the margins of Fresh Pond. 2 plants apparently belonging to the *Fluviatiles* from Can. l'.

2 *Carices* from the Wh. Mts. Beside which I found *C. saxatilis*, of your Mon. Cyp. & *C. atrata*; with nodding spikelets: the latter rare, the former very common in the higher parts. *Lactuca integrifolia*. In habit & place of growth this appears to differ from *L. elongata*, and also in the constantly (in 20 plants) sagittate form of the ~~large~~ leaves at the middle of the stem. The leaves are however rarely entire — that is generally toothed, and those near the root ~~are~~ sometimes occur with a filamentous midrib. These (the radical) leaves are long-spatulate, *Empetrum Conradii*? This was sent me from Plymouth as the *E. nigrum*, with which last plant I was familiar at the Wh. Mtn. station. Having no duplicates, I have cut these from my specimen. It grows somewhat erect to a foot in height I am informed & my specimens fully warrant this. In this, the flowers appear invariably to be terminal, whereas I have never seen the berries on the Wh. Mtn. plant other than toward the extremities of the branches.

I mean to visit the Mts of W. & N.H. again in the middle of the coming June by which I hope to find all the plants in flower & also to get the *Sweetflag*, *Alchemilla*, *Silbaldia*, &c which one may look for in vain the last of July; <sup>at</sup> which time both my visits heretofore were made. But the particular object will be the lichens, which I have made up of my mind is a sufficient subject for study for any man & letting the rest go. (Zuckerman)

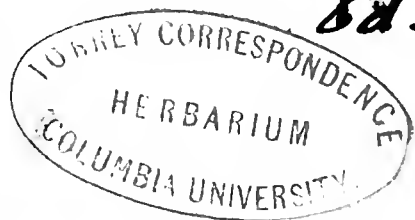
As I have made up this parcel hastily, I hope the scantiness of size &c may be pardoned in my specimens — as of many I had no duplicates, & was therefore obliged to divide my own spec.



And I pray you will excuse all you deem requiring excuse  
in this letter: for I know not but I have abused your time  
and patience to little profit: and had it not been that  
the encouragement you extended in your letter, was  
strengthened by the public notice to botanists at a distance  
on the back of the 2<sup>d</sup> No of the Flora — I should hardly have  
dared to commence an account of what wonders ~~have~~  
(to me) have met me in nature's fairest works.

I am with respects your obed<sup>t</sup>. serv<sup>r</sup>.

Ed. Vickersman jun<sup>r</sup>



Dr. Torrey

New York

P.S. I lately received a very valuable package  
which I supposed was owing to your kindness. It contained a paper  
of yours, one of Dr. Gray's & one of Mr. Arnott's. I shall fully  
appreciate the value of what I could not have otherwise  
obtained. The paper of Mr. Arnott struck me as one of the  
most elegant I had ever seen; and it must be pleasing  
to American Botanists, to see some other than the "*Chorodendrum*"  
which he mentions, or the out of the way shrubs that  
Prof. Eaton describes, — consecrated to you. This  
is indeed a return for my pamphlets.

Dr. Joney

New York



Cambridge 15 Mar. 1839 -

Dear sir

I write to say that I have this day committed to a gentleman, to be left at the Astor House in New-York, a small box of plants, principally lichens, which I have collected - & respectfully to your kind request now send with an enclosed account & letter.

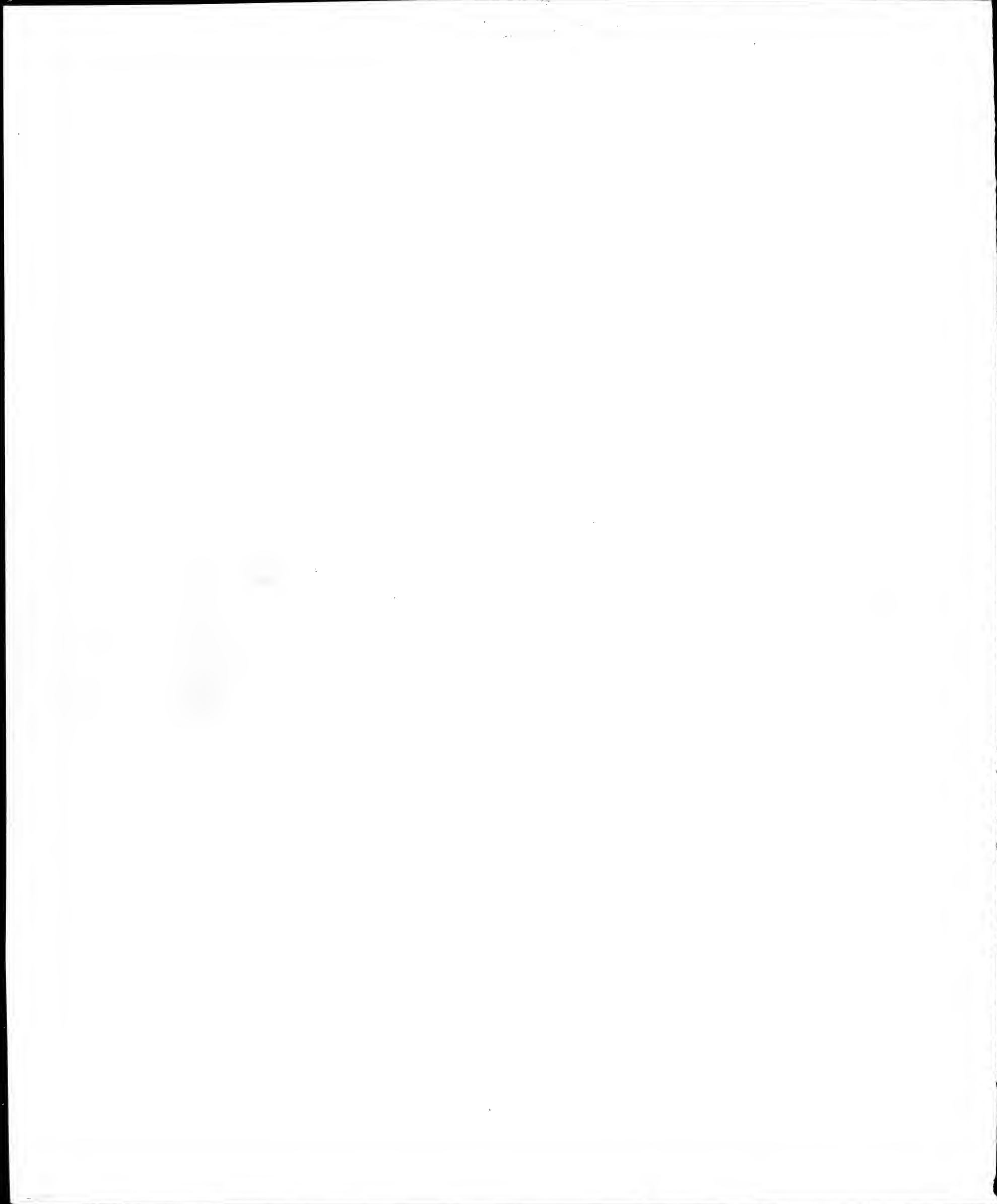
I must again ask you to excuse whatever you may not approve in my labelling or in any other respect.

I am with the highest respect.

Yours obt. Servt

Ed. Fuchsman, Junr

Dr. Torrey {  
New-York {



Recd. Sept. 7th 1839

Ans. Oct. 24th



Cambridge 2 Sept. 1839

Dear Sir

I was gladdened on my return from my last Expedition for this season, with the receipt of your kind letter of the 20<sup>th</sup>. I am happy to find that my plants reached you, & that some, as the *Empetrum* were acceptable. The specimens which I then sent were broken from my own, as I had no duplicates, but I have collected abundant specimens this summer in Plymouth, & can now send you a good sized plant & the ripe fruit, which last you mention as desirable. The Plymouth pl. I now find to have "trunks prostrate, with aurgent branches" as you descr. the N. Jersey pl. When I thought it "erect", I had not seen it growing, & drew my opinion from the habit of what I now find to be only the branches. The pl. flowers they say in Plymouth exceedingly early. This must also be the case with our *E. nigrum*, which I could not find in fl. even in June of this year. The ripe fruit of this last I have twice gathered in Aug. at on the White Mts. & found it full as agreeable (to me at least, because less insipid) as that of *Rubus Chamamorus* or *Vaccinium uliginosum*. If I do not mistake L. enumerates among its effects when eaten in a considerable quantity — "temulentiam" — a curious virtue, but I did not test it. And this reminds me to speak of the fruit of *Lonicera hispidula* of your Fl. Amer. I have repeatedly gathered & eaten it. It is a white berry of about the oblong shape of the fruit of *Vacc. uliginosum* & thickly sprinkled with

short black hairs. The flavour is an agreeable slight acid, combined with the peculiar taste of *Gaultheria procumbens* & like that pl. This flavour seems to be diffused throughout the pl. The substance is pulpy. Permit me again to digress — to say a few words about our *Whortleberries*. I cannot help thinking that the Boston Flora is nearest right in respect of this genus. Our *V. virgatum*, is so very far from *V. Pennsylvanicum*, as to be nearer in general aspect to *V. frondosum*. And our *V. Diomorphum* appears to me perfectly distinct. I have found this last with a hirsute corolla, uniformly in the case of a single fl. which was all I saw. This occurred at Keene, N.H. I should have mentioned one or two other things while speaking of the *Empetrum*. The *E. Conradii* does not appear as yet to be at all common in the Plymouth region, though I do not doubt their immense forest contains unknown stations for it. Two localities only are now known — both sandy knolls, it covers them in dense patches. The *E. nigrum* I have found on all the higher summits of the Green Mts. in N.H. as well as on the White Mts. *Lyimachia nummularia* I have little hope of. It has not spread, & indeed is almost if not quite destroyed in its present station by the removal of the soil. The *Carex atrata* of Nutt. must be rare on the White Mts. as it escaped Mr. Oakes. I have not found it since my first visit but I got (in company with <sup>Mr</sup> W. F. Macrae of Lower Canada, a very enterprising botanist) abundant specimens (necessarily immature) in June this year on the Nose of Mansfield, one of the highest summits of the Green Mts. N.H. which I will send you — with the others if possible. Mr. Oakes says neither of them is anything more than an Alpine form of *C. limosa* — & yet he doubts not the former is truly the *C. atrata* of Nuttall. I have been quite successful this season in my lichens. Some new & very interesting pl. have been added to my coll. But I do not expect to study what I have brought home till the winter. In the phænog. I have had some success. The true *Aspidium aculeatum* of Pursh got by him in the "Green Mts. N.H." was found by Mr. Macrae & myself on the side of the Chin of Mansfield — a sum-

met of the "Green Mts. Vt" (cf. Pursh: 1) growing abundantly in the region of  
high trees. My friend has since gathered this elsewhere but I have not  
yet received his specimens. On this same Chin, in the subalpine region  
& very much lower than it occurs on the White Mts. we also found the *Bartsia*  
*pallida*. But I must hurry on merely asking leave to mention that as  
these above were mutual discoveries of Mr. Macrae & myself & he or I may possibly  
make some little article for the press out of our summer labours, I should  
particularly desire that these may for the present — ~~unpublished~~ remain in confidence.  
At Plymouth I had the advantage of being in the company of Mr. Oakes, our  
great New England botanist. But without him I added two *Rhynchosporas*  
to our Map. Catal. : — *R. cymosa*, & *R. macrostachya* — the last indeed  
is only a new station. & also a new *Scirpus* — *S. olivaceus*. So that with *RR.*  
*alba*, *fusca*, & *glomerata*, Plymouth has already more *Rhynchosporas* than  
even West Chester co. Pa. as appears from Darlington. *Scirpus tuberculatus* was also  
exceedingly common & abundant, *S. subterminalis* equally so in the ponds, &  
*S. subquaratus* not rare on their gravelly shores. I will send you sp. from this  
station of all these as it is not enum. in your Mon. Cyp. We found also *Solidago*  
*tenuifol.* with other New Jersey pl. 6 *Utriculariae* were in full fl. in  
the ponds: and here I will mention that *U. cornuta* has setaceous root leaves,  
which are erectish & not bladder-bearing! This is the case when the pl. grows under  
water — i.e. mostly immersed & also when it grows in the very wet mud on the  
margins of the ponds. This fact, first obs. by me, was new to Mr. Oakes & I  
cannot find it recorded. These leaves resemble considerably those organs of the  
same appearance which are found on the *U. "resupinata Green MSS"* of Hitch-  
cock's Catal. a very beautiful new sp. also inhabiting these ponds.  
But I have hardly left room to express what I felt at the receipt of your  
unexpected & very flattering invitation in regard to that part of your new Flora  
which will include the lichens. Be assured dear Sir it will give me new  
zeal in my prosecution of the study of these plants — & if when the time shall



arrive for the elaboration of this order, my knowledge of the generally diffused forms  
 more sufficiently extensive & accurate, and by a comparison of specimens from American  
 Lichenists my doubtful plants be somewhat reduced in number — it will be the highest  
 satisfaction to me to make a thorough synopsis or other elaboration of the whole. To this  
 end I should immediately procure & in study the recent arrangements of Eschweiler,  
 Walroth & others, & particularly I should obtain the various works of Hoffmann, to whom I  
 am persuaded some reference is yet to be made. Hooker's View of the Br. sp. in his Br.  
 Fl. is of course a model of elegance, but it seems to me he has unwisely neglected the  
 modern systems of Walroth & as he says (Pref.) he has, — & has left some things where he  
 found them, which rest only on the dictum of Acharius. Among so many systems — for beside



John Torrey M.D. &  
 University of N.Y.  
 New York City



these there is Wahlenberg's, (invaluable) Sprengel's, De Candolle's, & L's by no means last;  
 as his sections represent modern genera <sup>it is difficult to choose.</sup> May I ask how long a period may probably elapse  
 before this distant part of your Flora is reached? Before visiting the Philadelphia Herbaria I  
 would call and obtain your direction & suggestion. But I am uncertain whether this should  
 be the work of next year or the year after. I expect a large coll. of the N. Caro. mts. lichens  
 by the kindness of Mr. Curtis. Maine must be thoroughly explored. And I am but an inexperienced  
 hand. Excuse these many questions: which I fear you will think hasty. But however contingent, the possibil-  
 ity of a design like this will influence all my present movements. I am dear Sir most respectfully yours, Edw. M. Carter



Sept. 2839

Read ~  
and.

I have put up a few plants  
Oct. 4th

acquisition of the past season mostly — some of which  
may I hope prove acceptable to you. There are some  
Alpine Plants from new stations — the mature fruit  
of *Empetrum Conradii* K. — with some Cyperaceae —  
of which, during a second visit to Plymouth from which  
I have just returned — I procured in a mature state.  
The *Psilocarya* is a most interesting & curious plant. It  
was first detected in its Plymouth station by W. Baker  
and subsequently gathered by me. The 2 new Map. *Rhyn-*  
*chospora* were first found by me. I have sent two  
*Eleocharides*, which I hope may prove to be ~~is~~ something —  
& two Cyperi which I could not at the time make out  
(are they both forms of the same sp.?) — though I have not

yet been able to set down to the study of either of these with  
you Mon. Cyp. — I am not therefore sure that they will  
be of interest to you. I have numbered them & should  
be much gratified if you will give me their names.

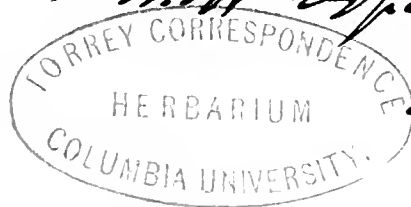
I have also put up some specimens of *Utricularia cornuta*  
showing a remarkable character — in the presence of subulate  
simple radical leaves or leaf-like organs: which does not seem to  
have been noticed: though I find in Nuttall's Gen. Pl. this is  
mentioned very briefly in a generic char. It is also found in the  
new Plymouth species of Mr. Greene which I also send.

There are also ~~Bigelow's~~ specimens of Bigelow's *Myriophyllum*  
*tenellum* — showing that pl. to possess a long prostrate rhizoma,  
which throws off <sup>erect</sup> numerous stems, generally infertile, & submersed — the  
fertile growing longer & emerged.

There are also specimens of *Betula nana* & *Salix repens* — which  
I luckily got ~~with~~ in the flowering state in June this year.

I send these by Mr. Harnden's Rail-Road Arrangement  
whose office is I think in Wall St.

I am dear sir most respectfully & truly yours



Ed. Tuckerman

Prof. Torrey }  
Havre. N. Y. }

P.S. I forward the package this day.

I trust you will excuse the errors of my labels. I have just found that the plant which I have sent as *Rhynchospora cymosa* is a *Ceratoscheenus* & I suppose *C. longirostris*. Not having Gray's Monograph to refer to & no specimens to compare with — & the descriptions being omitted in your Monogr. of the Cyp. (which I have) I was obliged to depend on the brief descriptions of the older books in studying the plant. I have just said that this plant is "I suppose, *C. longirostris*." But this I say only because I have no specimen of that sp. to compare with — ~~ought not to~~ can not be certain. It does strike me that it is a new species; though I do not know how important the characters are in which it differs from the descr. of *C. longirostris*. As the plant may possibly prove more interesting than I supposed — I will mention a little more of its history. It was found by me last August growing in large quantities in a pond (on the margins) in Plymouth. Mr. Oakes, subsequently visited the place — but though we carefully examined every pond with hardly an exception in the whole region (and it abounds with them) we were unable to discover any new station for it. In Sept. I have again this month visited Plymouth with Mr. Oakes to get mature plants of the various Cyperaceae we had previously gathered — & did not succeed in tracing it in any new spot. As I have above said, the plant grows in about a foot to 3 feet of water. To get my specimens I was obliged to wade — & I did not see a single specimen of plant that could be plucked without going into the water. There were immense quantities in the pond. *Ceratoscheenus macrostachys* (if I am not mistaken in calling it this species, though I feel quite confident it cannot be any other published one) was found by me also, much more commonly than the last, in sandy bogs adjoining & on the shore of the ponds. But while I claim these interesting discoveries — I cannot forget to mention that *Psilocarya*, and

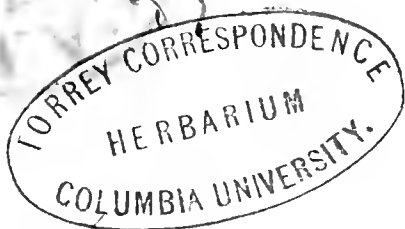
*Fuirena* & *Scleria* - *Panicum verrucosum* & *Scirpus subterminalis* & subquar-  
 on & a score of others owe their discovery to Mr. Oakes. The first alone, I suppose,  
 is worth all the rest. To the experience & observation of this gentleman I feel  
 I am very greatly indebted - as every one will feel who is happy enough  
 to know him. I have rather over 30 specimens of the first mentioned *Cera-  
 toxenus* & rather more of the last - so that I shall be able to furnish you  
 with more - if they prove desirable. I collected nearly 200 - but they were  
~~mostly~~ left behind by mistake & finally reached me in a very bad condition.

1814

Prof. Torrey

Univ. N. Y.

New York city.



single sheet

I have discovered *Chenopodium* on the waste part of Boston Common, which  
 I think must be *C. glaucum*. This is called "oak-leaved" in Hook. Bot. Fl. & the  
 leaves of this plant resemble considerably those of *Quercus bicolor*. It is small with  
 ascendent branches. The spikes are compound & leafless. The leaves have a grey bloom. I  
 regret exceedingly that I have not a single specimen. I gave all mine to Mr. Oakes  
 intending to collect again - but have not been able till it is now too late. I  
 will, however, obtain one from Mr. Oakes & send it by the next opportunity, with  
 a few other plants, that I have not been able to send at this time.

Recd? Oct. 17

Dear Sir. Arrd? Oct. 24

Cambridge 10 Oct. 1839.

You must excuse another encroachment on your valuable time, as I cannot but tell you how much I was delighted (I need not add instructed) by your letter of the 4<sup>th</sup> ult., just received. I regret that my package did not reach you as I had intended — and will take care that this shall not occur again. In regard to the many errors of my labels, though some are not remarkable in one so little advanced in the Science, others are owing entirely to the fact, that I packed up specimens of all my Cyperaceae — before I had myself studied them with the books. The Cyperi I had not looked at with a lens nor compared. And the *Scleria* was in precisely the same case. Mr. Oakes & I were both too busy in collecting to make any examination of our plants. And I supposed this to be (of course) our *Mafr.* already known sp. unknown to me, which was *triglomerata*. But the very morning of yesterday (I received your letter yesterday evening) I studied carefully the plant & before I read your correction of my label, had it finally put away in my herbarium as "*S. reticulata*." This is gratifying <sup>to me</sup>, — and yet it seems I could hardly have helped reaching this conclusion — as the agreement of the plant with the description is perfect — and your remark also in regard to the distinguishing char. of the nut could hardly escape notice in studying it.

I have never seen much of *Lactuca integrifolia*. The Cambridge station is a sandy common — producing *Aristida dichotoma*, *Paspalum ciliatifolium* or *P. vaginiflorum*, and here it is very distinct — as I think I saw specimens there. I have always supposed the sagittate leaves to be the best character of our plant.

With respect to the subalpine *Viburnum* which you appear to consider *V. edule* of Pursh (it seemed to me you did not speak decisively, but perhaps I have erred in this) I cannot but say that if this is Pursh's plant, it strikes me he has characterized it incorrectly as well as imperfectly. And then he found his plant on the banks of rivers throughout a large extent of the



U.S. while this seems a rare and little known Northern form. It was  
decidedly subalpine in both the stations from which I have sent it. At the  
White Mts. at an elevation of near (I should suppose) 2000 feet — & on the  
Mansfield mts. near a thousand feet higher. As remarked in your <sup>of V. exilis</sup> Flora  
it is a smaller and less straggling shrub than *V. oxycoccus*: which I did not  
meet with till some time after leaving the immediate region of the mts.  
The large *Xyris* (*X. Caroliniana*) grows only in the water, as is the case also with  
the *Ceratoschemus*, (*C. macrostachys*, var. of your letter) in Plymouth. I did not  
observe anything to qualify these statements. Is not that *Ceratoschemus* a  
very distinct looking form from *C. macrostachys*? I see the nuts resemble each  
other perfectly — & of course I have no doubt the fact is as you have  
decided: but I cannot but mention how striking the difference, both of  
habit and habitat appeared. I hope you ~~will not~~ do not consider me  
as meddling rashly in these difficult questions.

I am very glad I sent you the tall *Eleocharis*, that I labelled *E.*  
*tuberculosa*. I put away the plant in my collection with the smaller &  
every way different true *E. tuberculosa* — with the sage commentary at  
the bottom "*P. variabilis*:" supposing the differences were owing to immaturity  
& a richer soil! This I have amended now — & deposited the rare stranger  
in its own paper. Finding this species at Plymouth, I brought it to Mr. Baker,  
& asked him what this tall, wiry *Eleocharis* could be. He did not examine  
it, but said he supposed it might be as above. He postponed examining  
these plants till the winter. If I found an *Eleocharis* two years ago in  
Cambridge, which I could not make out — that I think may prove to  
be this species. It is now at Ipswich, with a few plants which I carried  
down some time since — but I shall compare it with the Plymouth pl.  
as soon as I can get it: and will inform you if it proves to be the same.  
Though this I do not think more than possible.

But I will trespass no further with this recital.

I have not had the pleasure to receive from you the Amer. Cyperaceae,  
and I bought my copy (a dupl. of that n<sup>o</sup>. of the Annals of the Lyceum)  
of Mr. Warner our Conchologist & Virtuoso: who I understood received his set as  
well as this number from Dr. Jay of N. Y. Your kind offer of "a corrected  
copy" including the Rhynchoptera of Dr. Gray will be invaluable & I shall  
be delighted to receive it. If this is not contrary to your custom — I should  
be greatly pleased with a word on the fly-leaf in memory of the donation.

You were kind enough in a previous letter to offer me the use of some valuable memoirs on the Hepaticae. Though these would undoubtedly give me an insight into the structure & organs of these plants, of which I am now perfectly destitute — I still feel I have hardly time to attempt the study. I merely pick up striking forms, & when I get an opportunity — send them to those to whom they may (I think) possibly be valuable — & then I leave the matter. The Mosses have always seemed to me the most difficult Division of the Cryptogamick Plants. And as I feel I have some hold on the Lichens I <sup>think</sup> that I ought to devote all my time to these. I mean that I have some general ideas, & the knowledge of some forms of most of the Genera. This being the case I collect these to study — but not the Mosses — which — or either of these — are enough (it seems to me) for any man. I therefore think that it will be best for me to decline your kind offer — at least for some time to come.

I shall endeavour to send you <sup>soon</sup> ~~the~~ another collection of my more curious plants, which I could not get ready before. Among these are *Viburnum nudum* (B. parvifolium, Bigel.), *Polygala cruciata* (fl. albis), *Chenopodium glaucum*, & *Gratiola aurea* (fl. albis) *Sabbatia chlorides* (fl. albis) *Digitalis glabra* & *filiformis* & *Paspalum ciliatifolium*, the three last all from Cambridge.

I am rejoiced to hear of Part III of the Fl. Amer. This is indeed a great work. There seems little enough Botanical feeling in this region: and Bigelow is still the manual of students — though he enumerates so very few of the rarer plants of N. E. They seem to look on the new Flora as something beyond them. It is in vain that I say this is only a stronger reason why they should study its arrangements, & tell them that as Botanists they should feel a delight in a work of such science, whether they are yet able to appreciate & understand it or not. Perhaps indeed it is true that N. E. is behind the age in Science. To be behind the age in learning is a compliment — and I believe we deserve it in some degree. But we must make no pretence to the Honours that is due to modern Science. And it may take a good while to bring us to the standard of Europe & New York. We owe all to Bigelow, but our all is but little.

I will take leave to mention my address: which is "At Mr. R. Morse's, Cambridge." I receive bundles safely by the Cam & O. Omnibus. I still reside at the Univ. though I have taken my degree in the last — & mean to for the present — as it affords me the use of some valuable foreign herbaria & some necessary books of reference. I could

hardly help writing you in this occasion — but I regret that the letter contains so little of interest. I trust you will permit me to write you sometimes, without meaning to trouble you for an answer.

I wrote you in reply to your letter of Aug. 20<sup>th</sup> & hope the letter reached you. It contained a few enquiries in regard to the Lichenes: and an expression of my feelings in regard to your very kind proposal in relation to a synopsis of the North-American Species.

I remain dear Sir, most respectfully & truly yours  
Ed. Tuckerman junr

Prof. Torrey.  
New York }



Received  
21/8/84

To Professor Torrey

N. Y. Medical College.

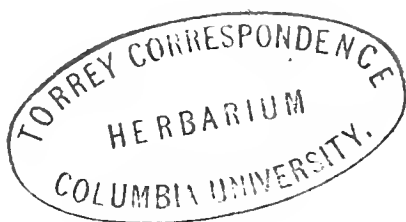
New York City.

single.



Recd Nov 5/84

And. Dec 25



Cambridge 30 Oct. 1834.

Dear sir

I had the great happiness of receiving

yesterday that very valuable parcel of plants with which you have enriched my collection. I am indeed grateful. The Cyperaceae are especially valuable at this time — as I have been endeavoring to study all the species that I have found in this region: & these rare & curious forms strike me with a peculiar interest.

And the phænogamous plants — & above all the Schizaea, have greatly delighted me. The valuable Leguminosae, & Labiatae — the *Goodyera quercicola* — & in a word all — are the very gems of my herbarium. I hope I shall be able in some degree to answer your kindness: though discoveries & novelties in this region do not come along every-day. Plymouth however must still contain undeveloped treasures — & I hope another season will enable me to gather something new to its flora. The last two seasons have been crowned with such signal success — that I cannot but think another will not be fruitless. Be assured I shall not forget my obligations to you.

The Van Diemen's land lichens I am also much pleased to see. Some forms strike me as very similar to, & probably identical with, ours. Others have a new aspect. I shall examine them carefully.

I am also very greatly indebted for your valuable present of

a copy of the Am. Cyp. with Dr. Gray's invaluable monograph & other work at the end. And here allow me to state a difficulty which I have found. I found among the Cyperaceae in the package a fine specimen of "*Ceratostichus corniculatus*" from "Louisiana." This I endeavored to examine but with only the following success: — Instead of the oval shaped nut represented in the plate to Gray's *Rhynchospora* — I found only a long subulate body surrounded with what seemed very long bristles. I think it must be immature: but was I mistaken in supposing the bristles so long? I am sensible I may very probably have committed some mistake here though I examined a good many spikelets with the same result.

But I have forgotten to thank you for some of Dr. Richardson's Carices. These I value highly indeed. And also for the grasses which are all so interesting. But I must stop here.

The grasses & carices new to our Boston region that I have found as yet are the following — *Paspalum ciliatifolium*, *Digitaria glabra*, *D. filiformis*, *Panicum clandestinum*. *Carex Oederi*, *rosea*, *muricata*, *filiformis*, *virescens*, *sylvatica*. — These at least are the most interesting. Beside these I have a small subalpine *Eriophorum*, which Mr. Nuttall allowed to be what I had named it, a subalpine form of *E. polystachyum*. This grew on the Grand Monadnock mtn. in N.H. But what is more interesting I think I have found *Chrysosplenium alternifolium*. I gathered a single specimen only & that not entirely satisfactory in a subalpine rivulet on the Green mts of Vt. The leaves are alternate & the plant appears not only to differ from *C. Americanum* but also to resemble the plates I have seen of *C. alternifolium*. According to Hooker it would seem this has not been found in the U.S. I shall examine it again, & if I do not find that I am in error, I will send it to you: though, as I have no other

specimen, I should like to have it again.

But I begin to be sensible I am occupying too much of your time. And I have said nothing of the many other interesting topics presented in your letter. In regard to the lichens, I shall only say that I feel quite out of place among the *viri illustres* with which you have associated me in the cryptogamical Flora; and almost fear to undertake what must be done so well. But I devote this winter entirely to the lichens. No less than nine bundles — the acquisitions of the past season are awaiting examination. And I shall go over again the whole of my collection. I have Scherer, Ach Meth., & Prodr., Sprengel, Wahlenberg, Halsey, & Hooker: & I have sent for various other books — but with the same invariable want of success which has always met me in sending for the books on foreign Catalogues. I never yet received a single volume, & yet the booksellers transmit the orders (as I understand) to Longman & Co.

The *Empetrum rubrum* must be very interesting: especially as it gives us 3 species of a genus so small.

The *Arachno* I saw in the Hort. Reg. — that is the name & description. I am very glad Dr. Gray has been able to deprive it of its barbarous name. I was afraid it would have to stand — unless indeed it was judged by the 223<sup>d</sup> Canon of the Phil. Bot. or any other Canon of good taste: — on the ground of priority. But it seems to me

canons are little observed in modern nomenclature: and yet Linnaeus's seem undeniably correct.

But I must conclude. I remain dear sir

Most respectfully & truly yours

E. F. Tuckermant

To Prof. Torrey.  
New York }



Chas. 18/4

To Prof. Torrey

Medical College of N. Y.

New-York city.

suppl. to

I found with "*Trichelortyxis mucronulata*" from "Louisiana" a little plant - which after some study I think may be "*Isolepis carinata*" of your Cyp. It is small, capillary - leaves with sheaths - the spike "growing from the side of the culm about half an inch below the summit" - the scales gibbous - & the nut papillated - & triangular. I mention this since, as it evident it got in by accident, I am not sure you can spare it. I believe however I will venture to return you my thanks for it: especially as I see by my invaluable copy of the Cyp. by one of the MS. notes you have so kindly added, that you have rec'd this "*Isolepis*" from "many parts of Louisiana." This is the way I suppose it got in. But am I wrong in considering it "*Isolepis carinata*?"

120? 80-26  
Lind. Dec. 25th

Cambridge 23 Nov. 1839.

Dear Sir

I have just finished the study of those invaluable Van Diemen's land lichens -- & haste to inform<sup>you</sup> of the results at which I have arrived. Of course there may be errors, & the work is not an easy one, but I have just some confidence in my conclusions. I must, as usual, trust you will excuse whatever is wrong.

No 29. *Stereocaulon paschalis*, var.

5. *Sticta demecornis*, Ach.

7. *Sticta diffracta*, Ach. (pari.)

7. *Sticta exscata*, Ach. (hnt.) These two last were together.

9. *Sticta aurata*, Ach. var. *atrinque villosiuscula*.

3(a.) *Sticta laciniata*, Ach. I am not sure that this specimen is, not being l. No 7. I.e. *Cyphella* & thin stems, are brown yellow, -- "pallide intersementibus", as Ach. says of those of *S. incrinata*, are not white, as they are in No. 7. And though No 7 & this plant are in different periods of growth (this being very old) there are still apparent differences in my specimen which lead me to conjecture its distinctness.

22. *Sphaerophoron umbrosum*, Ach.

10(a) *Parmelia conspersa*, Ach.

28. *Parmelia conspersa*, B. *stenophylla*, Ach.

10. *Parmelia perlata*, Ach.

11. *Parmelia* probably *capitata* in an old state. Specimen too small to allow of my opinion.

5(a) *Parmelia mini incogn.*

13. *Parmelia*. This belongs to that small group which includes *P. physodes*, *diatrypa*, *olpices* & 2 or 3 others. May it be *P. intermorphica*? But the Apothecia are quite remarkable in our plant which character does not appear in the desc. of *P. intermorphica*. I sent you specimens

of this very species last year, an-<sup>collected</sup>umer, which I ~~found~~ in the Alpine  
regions of the White Mts. I have since found it on the highest of  
the Green Mts. in Vt. May I ask your opinion in regard to this  
interesting lichen? Perhaps you possess *P. enteromorpha*, a companion with  
which would decide the matter. The primary Apothecia (which are very num-  
erous commonly) are large, cyathiform, or goblet-shaped — or perhaps hat-shaped  
with a very considerable concavity. These Apothecia have the lower part so narrowed  
as to present frequently a perfect figure of a goblet. In maturing these apoth.  
change considerably by the ripening & consequent growth of the disk which splits  
the margins; & they then present the appearance of large flat immarginate  
scutellae. Altogether it is the most curious Parmelia I have seen: and I should  
~~be~~ greatly delighted if you would spare a minute to give me your  
decision upon it. I shall send <sup>it</sup> with a parcel I have just got ready con-  
taining a very few plants of trifling moment which I was unable  
to get ready before: & as I sent you before a V. Hampshire specimen, I  
will now send one of my Vermont plants. Both are identical with that  
from Van Diemen's Land. I think you will be pleased with its appearance in  
a wet state — & it is well worth the trouble.

Nº 3. *Peltigera venosa*, Hoffm.

26. *Usnea florida*, var. near var.  $\gamma$ . *strigosa*! Ach.

27. *Usnea florida*, var. near var.  $\beta$ . *hirta*! Ach.

25. *Cladonia retipora*, Spreng. Most beautiful.

24 (b.) *Cladonia*.

18. *Cladonia*.

19. *Cladonia*.

24. *Cladonia*.

20. *Cladonia*.

21. *Cladonia*.

24 (a.) *Cladonia*. I cannot distinguish this from Nº 21.

Hooker quotes Sir J. Smith as saying that "to determine the species among  
the cup-bearing lichens is one of the most difficult problems in botany."  
This remark applies I think equally well to the whole genus, whether  
of the scyphiform or subulate-branched *Cladoniae*. Some of these Van



Dien. I think Cladonia resemble our forms & are perhaps varieties of some of our species but the most have a different habit, & (particularly 24, 20, 21, 24(a)) seem to belong to a section of the genus which is not represented either in our Flora (as yet) or in that of the North of Europe. Perhaps also the very curious *C. retifera* is one of these forms. I have not succeeded in finding these described in Sprengel's Syst. which is the latest authority I have here — but shall endeavour when I go in town to look further. The habit of this group is very much that of the caespitose Cetrariae & some of them resemble very much (at a glance) specimens of *C. Islandica*. And they appear almost equally cartilaginous.

And now I have to thank you for affording me this delightful & instructive exercise. If you find I am correct in general in these conclusions I trust you may be induced at some other time to give me another opportunity. But Van Diemen's land does not come along every day. In this branch as in every other it is only the fact that your specimens are the very jewels of my collection: & therefore it is not wonderful that I should be desirous of acquiring as many as may be. I shall prepare this winter a continuation of my article on N. Eng. Lichens containing as I am now sure, some very interesting forms, the discovery of the past season. If this winter is open, I anticipate also collecting considerably. With nothing to take off the attention I have passed the winter by far the best season for collecting lichens. I shall pay particular attention to the crustaceous rupicola, of which I have less than of any other branch. And I want nothing now but

books - which I have almost despaired of getting through our bookseller.  
I have indeed many in "practical purposes" - but still there is hardly  
any thing that I ~~do~~ know of that has been published on the Lichen that  
I would not gladly purchase.

And this reminds me to tell you how much I was pleased the other  
day with the examination of two parcels of Cryptogamous plants con-  
taining many lichens, under your kind & real. They belonged to the  
Honble Mr. Cushing of Salem, & when I saw them were in the

Rec'd. by parcel by  
the "package car."

Recommend him to cor-  
respond with Duby of Geneva

Professor Torrey  
College of Phys. & Surg.

New-York city.

Single

"Acres field" and "I"

Can. Lichen

Handy book

Compos. - Cambridge of Boston  
Don't know

lands of Mr. Emerson the President of the Boston Society of Natural  
History. I took the liberty of citing one or two of the plants in my herb. as  
I had not before seen authentic specimens. Excuse this proximity -

& Believe me, dear Sir, most respectfully & truly

Yours Edw. Mearns junr.

Prof. Torrey  
New-York



Recd. Dec. 23<sup>rd</sup> -

And Dec. 25<sup>th</sup>

Cambridge, 26 Dec. 1839.

Dear Sir

About a month since I forwarded  
to you by Mr. Harnden's conveyance a small pack-  
age of plants - including one or two of some value to  
me - & some others which I ventured to think might  
on some account ~~of~~ or other prove acceptable to you.  
Previous to this I addressed a letter to you through  
the mail, containing some account (which you  
~~had~~ had intimated you would be pleased to have) of the  
result of such study as I had been able to give  
~~of~~<sup>to</sup> the lichens from Van Diemen's Land with which you  
so kindly enriched my collection. Not having heard  
in regard to this, though I know your valuable  
time must be very much engrossed, and I am conscious

there was little or nothing that needed an immediate acknowledgment, not to speak of the many kind favours with which you have so cheered & encouraged me in my pursuit of the Science — I still am led to inform you of the circumstances — both because I cannot otherwise be sure you have received what I sent — & also that it will remove the unpleasant uncertainty which attends this state of suspense.

I had hoped in this second package & indeed expected without doubt to have been able to send you the Boston *Chenopodium glaucum*, & several other things, which though belonging only to me, were not in Mr. Baker's possession at Greenwich. A visit to that place for the purpose of going over these & other plants with Mr. Baker had been proposed by that gentleman & accepted to by me. But it is now very long since I have heard at all from him, & not feeling that I am perfectly aware of his methods of proceeding I feel there is no propriety in giving you the reasons why I have been unable to accomplish my purpose in regard to the

above mentioned plants. After receiving your letter in detail  
of the plants sent by me to you from Plymouth — I com-  
municated the substance of it to Mr. Oakes, in a letter  
immediately subsequent to the receipt of yours. Coincidentally  
to my surprise he has never acknowledged this letter, nor  
have I since heard at all from him.

Under those circumstances, I was of course unable to obtain  
the plants I wished to send you — nor am I able to  
say when it will be in my power. I consider  
that Mr. Oakes could not with reason have taken umbrage  
at my communication to him of your decisions respecting  
the Plymouth plants, though they differed considerably from  
his — indeed when I wrote to him, this did not occur  
to me as possible — & I know of nothing else  
which can account for his silence.

Perfectly alone as I feel myself to be, and in entire  
ignorance of all the real circumstances of this matter, &  
most anxious to gain your opinion in regard to one  
of the lichens mentioned in my last letter, I trust,  
dear sir, this intrusive letter may be received with your  
kindness

from yours most respectfully & truly  
Ed. Tuckerman junr

To Prof. Torrey.  
New York.

I have felt obliged to give you the reasons above detailed, and to mention in connexion with them the name of Dr. Oakley, — but for myself I retain for that gentleman the same respect I have had for him ever since I had the privilege of making his acquaintance. As I have said, I feel I know nothing of the real circumstances of the case, & have freely mentioned

To Prof: Torrey.  
N. Y. Coll. of Phys. & Surg.  
New York city.

single box 220.

to you what has occurred only because I could not avoid so doing. May I ask further that you will let this letter remain in the proper degree of confidence?

My letter of  
Acad. Ch. 11/12  
HARVARD UNIVERSITY

Cambridge 8 Ju. 1840.

Dear Sir

You will I trust excuse  
the evident haste with which this little pack-  
age is made up - I am just getting off  
for the White Mountains - to return through  
Maine - and am obliged to do whatever  
I may, speedily.

I am afraid there is little if anything in  
it of much value to you, but I desire  
at least to show that I am fervent  
of your favours: & would, to the best  
of my ability, respond to them. I hope  
to get some things of interest at the  
Mountains - & especially in Maine: where  
Mr. Nuttall has just brought an Empetrum  
which I ~~told him~~ thought might possibly  
be that E. rubrum which you refer to  
in your descr. of E. Canadensis, & also in  
a letter to me. He considers it identical

with the Plymouth M. when he got it, but could not give any opinion in regard to *E. subrum*. He also found an *Arenaria* very near apparently to *A. Gröenlandica* — but growing at a less elevation, and somewhat different: I have found the same plant on the Monadnock mountain in N.H.

I shall inform you of my successes (if I am favored with any) in the mountains & meanwhile

I am Dear Sir

Yours most respectfully & truly

Edw. Trebman, Junr

P. S.

I am (as are all here) delighted to have the complete 1<sup>st</sup> vol. of the Flora — to bind up — and use. Numbers are so inconvenient that I shall not delay it. May you be prospered to the end of this great and arduous undertaking! For who of botanists does not feel personally interested in its completion? And this reminds me to ask you if you remember saying something about a set of British-American lichens — that I was to have the privilege of using. I am going on as I may, but with the exception



of one or two European *Urtica* Sicci — I have  
no specimens for comparison: I should be indeed  
glad to get any. Could not you favour me  
with some of those enum. in your Catalogue of  
the plants of N. Y. 1819? I have written Mr.  
Halsey — about a year since, for one or two  
described in his Synopt. View, but he has  
not replied. I have a set of maps from Dr.  
Greville (they came to me from Mr. Doubleday  
who got them of Dr. Greville) & a set of the  
alga I am expecting the arrival of from the  
same distinguished botanist (through Mr. Double-  
day) — but no lichens.

"A Further Enum. of N. E. Lich." is in press, by me,  
in a forthcoming N°. of the Boston Society's  
journal: it will contain two or three species  
of interest. I hope to get more at the  
White Mountains this season.

If it be not too much trouble, I should be very  
glad to have the right names of two or  
three Cambridge Canices that I have sent in this  
parcel, as we have not abandoned the idea of a  
Catalogue of our plants, at some time or other.

Please excuse the informality of this note which  
is greatly hurried.

To

Prof. Torrey

Coll. of Phys. & Surg.

New-York

N. B. My parcel will be forwarded by Harnden's Express.  
I shall leave it at the Office this (Saturday) morn<sup>g</sup>.

Recd. Sept. 6<sup>th</sup>.

Ans. Oct. 8<sup>th</sup> 1840

Cambridge Mass.

4 Sept. 1840.

Dear Sir

I forward with this a small parcel  
of the plants collected by me in New-Hampshire the  
present season: some of which with I hope prove  
acceptable. I succeeded in finding a few that had  
only (so far as I know) been previously found by  
Mr. Oakes, and belonging to the variores of our  
alpine Flora, — but nothing I fear, in the phero-  
gamous division, which you will consider new. Some  
were however, very interesting to me, — such as  
the series of specimens of the grass called by me on  
a previous occasion "*Aira pilosiuscula*", & others. I was  
told by Mr. Macrae of Montreal who recently vis-  
ited Boston, that Dr. Gray considered this grass an  
*Agrostis*, but I am unable to cite any other  
name for it than the above, until I hear  
further. I noted on the label of my specimens originally

sent with the above name, the extraordinary character of 1-flowered spikelets, — but it did not for some reason or other occur to me to call it an *Agrostis*. There are other plants in the parcel which I should ~~be~~ be very glad to know more of — & it is possible some of them may turn out to be something, — but this you will easily decide.

I do not know when I shall be able to fit down to the study of various of these which I have sent unnamed, and I have therefore not hesitated to send them as they are.

I intended to have visited the station of Mr. Nuttall's Maine *Empetrum* — (in regard to which I ventured in my last letter to propose the question or guess — if it were not "*E. rubrum*", referred to by you: but I had not compared the specimens with your diagnosis of *E. Courandii*, and felt it was hazardous something;) but was hindered.

A new number of the Boston Journal of Natural History is in the press here, and also a Report by Prof. Dewey to the Gov<sup>r</sup> on the Botanical Survey of the Commonwealth. From the former a small article by me.

on our lichen, has been struck off, and I take the liberty to present it to you with this.

I have just received a valuable box from my friend Mr. Doubleday, including 4 bundles from Dr. Greville - 2 of them Algae - & the other 2 miscellaneous. These were obtained by Mr. Doubleday, as I understand, by exchange for American insects. The bundles contain half a dozen lichens from Mr. White of the Br. Museum. These are from New-Holland but quite inferior specimens to yours from Van Diemen's Land.

I have ventured to note on the label of the specimen of *Potentilla minima*, &c., sent with this - a query if this were not probably the plant mistaken by Pursh for *Sibbaldia procumbens*. The resemblance is very considerable between the two plants - and it seems no unfair supposition that Pursh might have been wholly unacquainted with the species "*Potentilla minima*", to which the little plant of our mountains is referred. If this be correct, we shall have the satisfaction of striking entirely out of our Flora, a <sup>mistake</sup> ~~plant~~ which has

led, I know, to more than one wild-goose chase.  
The *Carex atrata* of Nutt. I feel quite sure must be the  
alpine var. of *Carex limosa* sent with this. W. Greene  
has kindly favoured me with a specimen of the former  
fine plant from the British mountains, and I am con-  
fident we have nothing on our alps resembling it, ex-

PAID

To Prof. Torrey

Coll. Phys. & Surg.

New-York

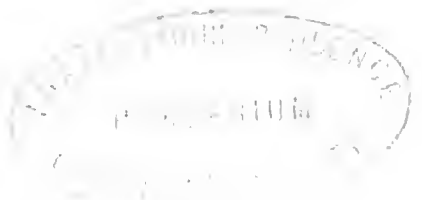
single, paid.  
~~by 288.~~

cept this var. of *C. limosa*.

With great respects, I remain Dear Sir

Prof. Torrey.

yours Edw. Tuckerman jrs.





Accd. March 29th 1841.

by D. Grant.

Recd. July 4th

Cambridge Mass. 1 Feb. 1841.

Dear Sir

There were two or three plants that you mentioned at your auspicious visit in October last, and desired me to send you. The fear that they would prove of little account, alone, has hindered my doing so before. I have now put them up, with a very few others, and send them by Harnden. On account of the small n<sup>o</sup> of specimens, I thought they would best reach you in this 4to Memoir which I selected as the most convenient thing to put them in, as I had no pasteboard.

The *Viburnum*, I have no doubt are the true *V. nudum* & *pyramicum* of the Fl. Borst.

As Dr. Bigelow is said to have long given up the business of exchanging — I think they may have some value, which they would not have of their own account. The *Monardella* plant grows just below the bald rocky summit, in abundance. I gathered what I supposed the same

pl. or several of the Green Mtns. in Et., and have the specimen in my Coll.<sup>n</sup> And I picked a fruited specimen, riding with Mr. Baker, somewhere in Plymouth County, which he said was *V. pyrifolium*.

The *V. nudum* of Cambridge, is as Bigelow remarks, so far as I have obs<sup>d</sup>, rare. I have never been able to understand the differences between the above *V. pyrifolium*, and the other, very satisfactorily.

I send also a pl. which I found in Plymouth, and supposed to be identical with the *V. nudum*  $\beta$ . *parvifolium* of Bigel. found by Mr. Greene at Sandwich, in the Plymouth region, about 20 miles further south.

Mr. Baker was with me at the time, and when I shew it to him, thought my supposition probable. I regret I have never thought to shew it to Mr. Greene, but you will judge.

If the specimen is not of any particular value, I should like it again, as I took it from my collection, but otherwise, it is perfectly at your service, and I am very glad that it is of any service.

You wished me to send some more of *Carex* *Scirpoides* which I have done, together with some of my little *Stipa* sive *Agrostis*, which I hope will be greater.

These, with Mr. Nuttall's two discoveries of last summer, and *Galium verum* from a new station, and one or two other plants are all I can get together, that with any excuse, I can venture to send. But I hope you will not be unwilling to take the will for the deed.

There is also in the parcel a copy of the recently published article in the Journal of the Boston Soc. Nat. Hist., on Lichens — which I have taken the liberty to inscribe to Dr. Gray. Would it be satisfactory to him to receive any of my alpine plants? I am desirous to obtain a few <sup>plants</sup> from him for my collection, if it would be of any object to him to receive what I can send in return. If I may particularly, a few *Carices* would be a much valued acquisition, and I should not care what species they were, for the most common are as difficult as the most rare. If there is anything of the White Mountain plants that he would wish, it would gratify me to put them up. But I would not by any means take up his time with the drudgery of putting up specimens, unless there is something that I can send him in return.

Mr. Greene has sent me all his lichens, including many  
of value — though they are not arranged, nor all named.

But may I not hope to see some authentic American  
specimens, such as you once promised me? I have had  
to depend wholly on foreign books and foreign specimens

1884  
To Prof. Torrey  
Col. Phys. & Surg.  
New York  
single paid.  
box 228.

To explain doubts and difficulties — but I need not say how ear-  
nestly I long for that assistance which your specimens of  
our species alone can give. The want of this led me to the dangerous  
step of making two or three new species in this article which I fear I may  
have to take back, though at present I see no reason. I am Dear Sir most respectfully,  
+ truly, Edw. Tuckerman jr

Re D. Apr 2nd  
Am? April 5th

20

LIBRARY  
HARVARD  
UNIVERSITY  
CAMBRIDGE

Cambridge 2<sup>d</sup> Mar. 1841.

Dear Sir

Being about to visit England &c.

I write to inform you, in the hope that I may  
have the pleasure to be useful to you in some way.

I shall be happy to take any letters or parcels  
for England; Paris, or Geneva. If you have occasion  
to send to Sir W. J. Hooker, Prof. Delandolle, Dr.  
Brooks, or Mr. Dury (to whom you advised me to  
write) and would mention the bearer as one of  
your correspondents it will greatly gratify me.

I have never before been placed in a situation to  
write 'letters of introduction' and feel a good deal of  
delicacy in regard to them. Add to this that the  
circumstances in which I make the voyage are such  
that I cannot expect to be master of my time  
at any place, and know not certainly where we

may go, and I had almost resolved not to  
trouble you with this, not knowing certainly whether  
you would have anything to send.

If however you will enable me if circumstances  
shall permit, to see any of the distinguished  
botanists that I have mentioned, or any others,  
it will be a happiness to me the rest of my life.

It is possible I may not return with my father  
and his family, but remain behind a year or two,  
in which case also I may perhaps be situated.

Dr. Darlington with whom I have had the great  
pleasure to make an exchange of plants — sends  
something to Sir W. J. Hooker by me — and  
I suppose I shall take several letters from  
Mr. Greene — though I know not yet posi-  
tively what he means to do.

We go in the Acadia Steam-ship, which sails on  
the 17<sup>th</sup> prox. (April.)

In haste I am dear Sir most respectfully & truly

Ed. Tuckerman jr

Prof. Toney  
New-York



P.S.

One month since I sent a small parcel of plants to you by Harnden's Express. It contained a few that you expressed a wish to have sent — and to these I had nothing that I could add. I hope they reached you.

If you have any thought of sending me any more plants they will be particularly valuable, as I mean to take out with me what I can. I cannot forbear to mention this, but I shall not be surprised if you think best to postpone the matter for the present. It does not deserve a moment's trouble or thought.

P.S.

I shall be very happy to take anything of any size that you may wish to send.

PAID

8/4



To

Prof. Torrey

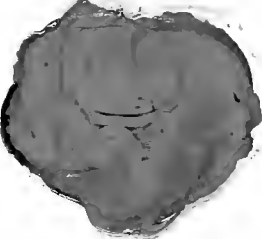
Col. M. Phys. & Surg.

Engh. paid.

~~for~~

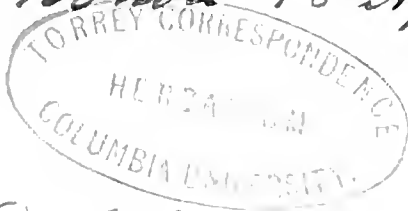
box 228.

New-York



Rec? Apr 19<sup>th</sup>

Boston 16 April 1841



Dear Sir

I had this morning the great happiness to receive your invaluable package. I shall not attempt to express how it delighted me. Allow me to express to you my warmest acknowledgments for this great kindness. Will Dr. Gray excuse me if I do not at this time particularly acknowledge his very kind favours. But I am overwhelmed with matters, for though we do not fail till to-morrow — everything must go on board in two hours. I hope to make such use of the opportunities which you and Dr. Gray have so generously furnished me with, as to be of more service as a correspondent when I get back. It is indeed a great thing to go thus provided: and I feel more than I can say. I will carefully attend to the parcels for the distinguished foreign Gentlemen with which you have entrusted me. May it be granted me to see the illustrious Staudotte!

But I see ~~he~~ is sick: and I fear by your letter  
that I may not be permitted to see the great Botanist.

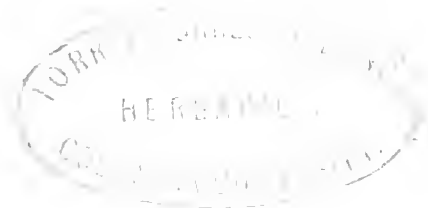
our Bankers in London are the Messrs Barings.

But you must permit me to excuse myself  
and to speak of - that haste which obliges me  
to say little where I would say much indeed.

If I remain abroad I will inform you, and  
hope you will allow me to be of service to  
you and to Dr. Gray: to whom I would pre-  
sent my thanks & best respects.

I remain dear Sir most respectfully & truly  
Your obliged serv<sup>t</sup>  
Ed. Suckewanig

To  
Prof. Torrey  
N. Y.



P. S. The large parcel of plants is the greatest  
treasure I take out. Mr. Greene has given me  
another invaluable set. And Mr. Oakes has  
furnished me also.

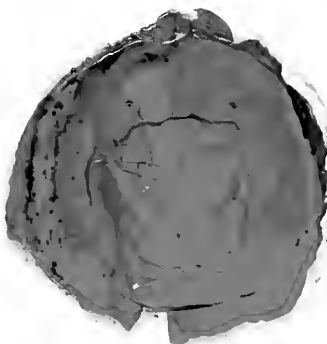


PAID

To Prof. Joney—  
Colt. Phys. & Surg.

New York

single. paid  
box 119.





Recd. Oct. 2<sup>nd</sup>  
and by Dr Gray  
Oct. 1842



Dear Sir

Our party being now about to return home, and meaning myself to remain behind, I have sent by them some memoirs and books sent to me by gentlemen here for you and Dr. Gray. These are all directed to the care of Dr. Harris of Harv. Univ. There are 7 or more from Mr. Webb, which I have put up together; 2 from Prof. Alph. DeCandolle, 1 from Mr. Newman, &c. Three letters also sent me by Mr. Webb, I forward by mail. I shall spend the winter at Berlin, where I hope I may have the privilege of hearing from you. As I do not know as yet where I may reside, I should beg that my letters, if you should so favour me, may be sent to the care of E. H. Welch Esq., a young man studying at Berlin, who is settled there.

I have enjoyed exceedingly my botanical adventures on this tour. I could hardly have expected to see so many lights of science as I have done. To you and to Dr. Gray I owe it all, and I cannot express as I would the deep sense I have of his kindness and yours.

In Britain I have seen Sir Wm. Hooker, Dr. Gre-  
ville, Dr. Lindley, Mr. Bentham, Dr. Boott, Mr. Merz,  
Mr. Bennett, Prof. Balfour (the successor to Sir Wm.  
Hooker's chair), Mr. Newman, Mr. Loudon, Mr. Lam-  
bert, & others. Above all I have seen "the great Robert  
Brown", as Mr. Nuttall once called him — and more  
than once. Dr. Greville's kindness was great; and I never  
passed more happy hours than in his house. I have been  
three times to Sir W. Hooker's. He is charmingly situ-  
ated, just out of Kew — the house and the grounds  
being both just the best ideal of comfort and con-  
venience. The library & herbarium, the last in a series  
of rooms of the same size, along an upper entry which  
is wholly appropriated to the purpose, and the plants ar-  
ranged in cases around, and also in the centre of each  
room, struck me as superior in commodiousness to  
any I have seen except, <sup>only</sup> the herb. of the Garden of Paris.  
The view from the library, <sup>windows</sup> of fine old elms & a green  
lawn beyond is very sweet. Mr. Webb of Paris, was  
also most kind and hospitable. At his table I had  
three opportunities of meeting foreign botanists, and  
he introduced <sup>me</sup> to almost all the Parisian investigators  
of the science. I was presented to Mr. DeCade, Mr. Ad.

Bronyziat, Mr. Gaudichaud, Mr. Main, and above all  
Dr. Montagne that excellent man. I saw also Mr. Gay,  
Mr. Guillemin, Mr. Boissier, Mr. Decaisne, Prof. Tenore  
and others. The Baron Deleport received me with the  
urbanity of the old regime, and gave me free per-  
mission to visit his library & other splendid apartments  
containing ~~the~~ <sup>his</sup> great herbarium. But I must stop.  
You will hear by this packet of the death of Decandolle.  
When I was at Geneva, enjoying the kind civilities of  
Prof. A. Decandolle, though I did not venture to ask  
to see the great botanist, he was not considered to  
be in a state of immediate danger. I have since ~~the~~  
I could have seen him had I asked. This was about  
the 11<sup>th</sup> of Aug. Towards the last however, Sir Wm.  
Hooker told me his suffering: greatly increased, so  
that it was evident that death would be the only  
relief. Dropsy on the chest was the immediate cause of  
his dissolution — but I believe this was accompanied  
with a general breaking up of the system. Mr. Duby told  
me he ~~had~~ <sup>had</sup> attributed this prostration of Decandolle to his la-  
bours on the composite. The other botanists and eminent  
men above mentioned are all well. Mr. Menzies as  
late and as hospitable as possible. Mr. Lambert seemed  
also in good health. He gave me a message to Dr. Gray

which I have to deliver. It was — that L. M. Lambert,  
 had found Pursh's Cassia, and that they were at Dr. Gray's  
 service whenever he pleased to send for them. I am quite  
 sure I have got the message right, but it was given  
 me just at taking leave, and I cannot be certain about the  
 words. I have gone through with Clayton's lichen, & also with

ven  
 of

~~Dr. Gray's list of lichen~~  
 Dr. Hearn Boat Mail

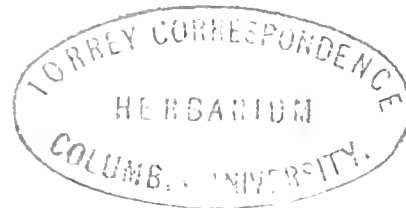
Dr. J. Torrey

Prof. Bot. & Chem.

coll. Phys. & Surg.

New York.

single



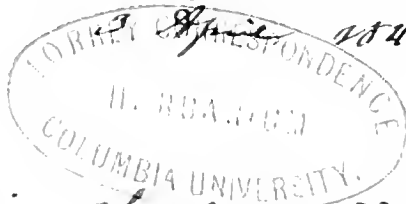
Michaux's. The latter's *Umbilicaria pustulata* is *U. Pennsylvanica*! I  
 want to look at those of Walter's herb. (for he has gotten *Cetraria*  
*nivalis* down in his Flora) if you can favour me with the address.  
 I understand Dr. Gray visited the family, and indeed he mentions it in  
 his Account of 3<sup>rd</sup> Eur. Herbaria. W. Brown has gone by the way of Gib-  
 raltar to Marseilles & Florence to attend the Congress of Naturalists.  
 With my best thanks and respect to Dr. Gray, I am dear sir  
 most respt & truly yours Ed. Tuckermans

Dr. Torrey.

Recd

Wed. Apr. 14.

Union College Schenectady N.Y.



Dear Sir

Excuse this short and hurried letter which is only to ask your kind consideration of the little pamphlet which accompanies it. Without your long continued kindness, I could never have written it: my only hope is that it will not prove to be wholly unworthy of that kindness. I was led to publish this tract by the following ~~case~~. While in Europe I had frequent opportunities to procure plants by the kindness of the botanists to whom I presented parcels of our own species. They almost invariably asked me what plants I preferred in return. My answer was almost always, Carices, Cyperaceae, Eriopogon or Juncus. I thus acquired a large and valuable collection of Carices - to which Sir Wm. Hooker with his great liberality added such boreal American species as he still had specimens of - a large and of course very precious set of specimens - and the excellent Dr. Vahl added an

all but complete set of the Greenland species collected by him.

When I got home, my first desire was to study my Canices. I began with Knuth — but did not get far without finding that he has widely separated species that belong together most clearly — (as for instance when he takes *C. ~~pa~~ vaginata* from the neighbourhood of *C. panicea* — and *C. rotundata* from that of *C. vericaria* — and then puts these very different species together with the fulva group.) and this led me to try myself to arrange my collection, for myself. After 3 months of the hardest work which I have ever yet encountered — I got as far as I thought I could get, & concluded to stop: not because I was, though; but because I could do no more. For my own gratification I thought I would have a few copies printed — & I have tried to put it into Latin.

Whether I have failed throughout, I know not: I am content with having laboured well and long.

But I trust the next attempt to arrange this  
Species, will have been much facilitated — by  
this — the errors of which will in some degree  
be as useful as its facts.

Excuse my boldness in thus speaking of my little  
paper. That it may meet your approval is  
the hearty desire of

Yours most respectfully and truly  
Ed. Tuckerman



Prof. Torrey.



To

Prof. Torrey

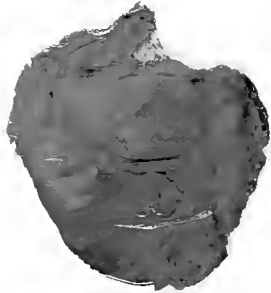
College of New Jersey

Princeton

N.J.



single  
paid.

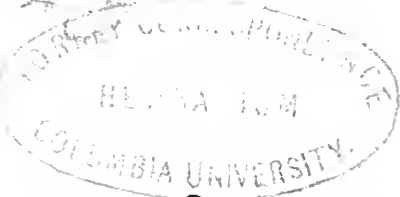


163

Hand. Oct. 28 1843

Mr. Coll. Schenck B. M.

9 May 1843.



Dear Sir

I was made very happy by the rec<sup>d</sup> of your kind letter in reply to my note sent with the Enumeration of Larices. I hope your final opinion on my attempt at arranging the species will also be favourable. Dr. Gray has also expressed a very kind opinion, and Prof Dewey. I have also received a very pleasant letter from the excellent Dr. Santwell, whose experience has been so great, that I felt his opinion on the affinities of the species was very valuable. It seems to me indeed that no one could labour so long and sedulously upon anything, without arriving at some results.

I was very much pleased to see *C. Barroettii*, which you must have warmly welcomed. I suppose it belongs of course to the group called "Acute", and is near to *C. glauca*, as indicated in your Monogr. *C. Muskingumensis*, or

*arida* must be distinct. And yet the habit is that of *H. lagopodioides*, I think, while the spikelets seem to denote one extremity of an ideal form, of which *C. scoparia* is the other. But the arrange<sup>t</sup> of the Cyperogr., as well as the observation that all the

forms of fruit, narrow as well as broad, might almost be referred to one species, seemed a confirmation of my view. *C. pedunculata* was accidentally omitted, though its place was indicated in the Preface - in *Digitata* - nearest to *digitata* and *clandestina*. Boott actually places it between *C. Mexicana* and *C. Franklinii*! & Kunth makes a group of *pedunculata* *Willdenovii* & *nigromarginata*!! To some of the groups I have appended the names of Fries, Kunth &c. But perhaps I could have claimed there. Fries's "Montane", consisting of 3 sp. with it was not difficult to associate - but mine of 23 sp.

But I must weary you no longer with this. I wish I had had *C. Fraseri*, which I have only seen in Europe. But a third of my collection, perhaps, is not included in my Enumeration. Such species as *venusta*, *dasycarpa*, *Barrettii* &c I did not receive till too late - of others as *aristata* &c my specimens were not sufficient to study - and of others I could not arrive at a satisfactory opinion. But I thought that without these I had enough to deal with - as much I am sure, as I ever want to have to study again.

I trust you will excuse me if I ask you, in case the memoir on St. Fremont's Plants is pub<sup>d</sup> - that you will favour me with a copy - especially, as I am most anxious to get everything on our Botany - I have even succeeded in getting your N.Y. Catalogue of 1819 - now very scarce I believe - and the copy you sent Mr. Lambert of your Enum. of <sup>the</sup> Genera of *Pinus*. plants appended to your edit. of Lindley. This will, I hope be my excuse for asking for the new Memoirs, if it be perfectly convenient to you to

furnish it. I have thought much of your  
very flattering proposals that I should undertake the study  
of the Junci for a Monograph. I feel that I may attempt  
it, though a little look into Kunth's last volume makes  
me shudder at the array of species & synonyms — and  
the horrible confusion in which some of your most common  
sp. seemed to be involved. I hardly knew what names  
to call our Junci by, in the Cambridge Catalogue. But if  
you will let me try, with all your specimens, I will do  
my best. I have collected everything I could, & have many  
from Wahlenberg, Kunze &c. Again I say, I will try;  
and take good care of all your collection. I am sorry  
indeed that Mr. Greene is not a working-man in the  
publishing way. He is very fond of the Junci, and discovered  
some of our best sp. as *J. militaris*, *J. Greenii*, *J. pelocarpus*  
&c. (fide Kth!) &c. But he will not write. When may  
I hope to receive them? I ask, on account of my expected  
trip to Mt. Katahdin, (with J. Gray & Mr. Oakes, I  
hope) in the beginning of July or end of June.

I have constantly looked forward to the opportunity  
of having something to send you from my Europ<sup>e</sup> collec-  
tion. I have splendid spec<sup>ms</sup> of *Carex Norvegica*, *C. sali-*  
*na* & *C. maritima*, discover<sup>d</sup> & gathered by me on the West  
coast of Sweden, in a region of which two Floras had been  
published, <sup>in</sup> both of which these are omitted — and many  
others. I have also a number of Pursh's MSS — the whole of his  
first planned work in 12<sup>o</sup> (see Pref. of his Flora) which was never

pub<sup>d</sup> - his own Map, drawn by himself, of his routes - his presentation  
copy to Lambert of his Flora with all the species (it would  
seem) noted, which Lambert proposed, and many notes by Prof  
Don; and some, if I mistake not, in your hand.  
Pursh's own Herbarium was sold to a gentleman in the N. of Eng<sup>d</sup>  
for £25 - but I have a very large Bundle consisting entirely  
of Pursh's plants & incl. all the Carex, Junci, Oaks &c. &c.  
W. Brown also was so kind as to shew me a coll<sup>n</sup> in square  
white paper, of Canadian pl., appar<sup>tly</sup> put up by a woman, but  
which he consid<sup>ed</sup> Pursh's collecting. 2 large Bundles of his Can-

Prof. Torrey  
College of New Jersey  
Princeton  
N.J.  
single pair

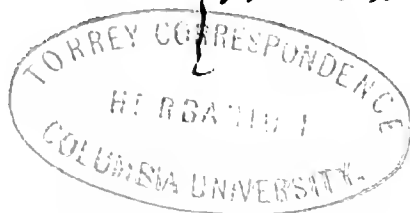


ada collections, wholly without tickets of any sort, and in  
loose common paper were sold with the Cabinet or Herbarium  
for 25<sup>l</sup>. But I must stop. Most respect<sup>ly</sup> & sincerely yours  
Edw. Tuckerman jr.

Recd. Nov. 2nd

P.B. I am just up from a severe rheumatic attack (my first & therefore not the earliest) which I brought from the Mountains. May this be my excuse for so insufficient and unsatisfactory a letter. I am delighted to hear that your department of the great New York Work is soon to be out. It is a magnificent plan.

Boston 30 Oct. 1843.



Dear Sir

I was much pleased to receive your kind letter of the 25<sup>th</sup> — which only reached me last evening — & hasten to reply. I trust we shall soon hear that Dr. Gray is once more at home and in good health. I should be pleased to receive Mr. Buckley's plants, if they do not much exceed the sum mentioned in your letter. The truth is I am not yet fairly engaged in the buying business — in which Sir Wm. Hooker & many others abroad, and Mr. Greene at home have done so much; and can hardly say I wholly like it. It is too much like making a shop-business of Botany. It is this I no more in Mr. Cumming's hands from all that I heard. But I know it is not so here.



I acknowledge the receipt of the valuable parcel containing the *Juncus* & *Luzula* which you so kindly sent me, I am sure. But I received it just at the time that I was summoned to Boston to see my honoured father for the last time: and I know you will excuse me if (for I cannot remember with perfect certainty) I failed in the proper acknowledgment of so great a kindness.

Mr. Baker is hard at work on his White Mtn Flora. He has been there the whole summer making descriptions & specimens. He has added, *Festuca vivipara* & *Paronychia argyrocoma*! & *Luzula arcuata*, this year: found plenty of *Cladonia atrata* & *Graphalium Lupinum* & done a vast deal of the hardest work.

In September (I could not go earlier) I went to the mountains & remained till about a week since, collecting Lichens & Mosses (the latter for Baker). I also made discoveries. At Franconia Notch, belonging to the White Mtn range in a pond I got *Subularia aquatica*. *Isotria lacustris* in all the ponds within 20 miles. *Rhinanthus Crista Galli* (in situ natural!) in the



alpine ravine called Baker's Gulph, with *Bartsia pallida*  
& *Veronica alpina*. I also found the *Luzula* & the *Fes-*  
*tuca* — but these two Mr. Baker had previously discovered.  
I attained after long search to the height of your desires  
in finding a good & abundant station of *Aspidium*  
*aculeatum* at the White Mtns. It seems to be  
fated that nobody but Macrae & I shall ever come  
across this most striking & elegant Fern. I heard  
when I got there of some curious plant in the  
Notch Slides, but Mr. Baker was at home & nobody  
knew or would tell where it grew. I went to work  
& ranched the Notch, till I not only found  
it where Baker had, but in a new & very  
abundant locality, where I made 150 fine & not  
large specimens. It is a *Paronychia* — & Baker says *Asplen-*  
*argyrocoma*. I got several interesting Lichens & am  
very hard at work in making out a complete  
Enum<sup>n</sup> of the White Mtns plants of this side,  
with descr<sup>s</sup> for Mr. Baker. As soon as I get them  
off my table — I have looked forward with great  
pleasure to sending you all my rarities as ever in  
duty bound. Alas the Aste! Mr. Greene has my only two  
specimens, which agree perfectly with his own. I have

been so long, unsettled (not having thought of  
 Botany till my trip to the White Mts) that I have  
 not got back a spec for myself. I cannot find  
 him now but will send you the spec<sup>n</sup> in my  
 parcel — for exam<sup>n</sup> — if Mr. Greene has kept but  
 one. The plant grew in this instance in open grass-fields  
 between the 2 Colleges — with about the habit & of the  
 size of *A. carneus*, which I thought was it at Ips-  
 wick. The agreement of the Schenect<sup>y</sup> plant with Mr.



J. L.  
 Professor Torrey  
 College of New Jersey  
 Princeton  
 N.J.

Festuca  
 centy of

single.

Greene's orig<sup>l</sup> specimens was complete, as he & I were both satisfied.  
*Quercus macrocarpa* & I think *Ulmus racemosa* were found at Schene-  
 ctady, I believe. I have spec<sup>n</sup> of the former: but I was not long  
 enough in the State to know what is rare there.

Excuse the haste & defects of the above. I am dear Sir  
 Yours mo. resp<sup>t</sup> & sincerely  
 Edward Tuckerman

And  
April 14. 1843

P. S. I hope this winter to get my plants all arranged, and the duplicates laid out. My coll. of *Carex* is very fine. I have all Vahl's Greenland *Carex* with Drejer named & described in his "Revisio". Vahl told me at first that Drejer had distributed all his duplicates — but he finally enriched me with a nearly complete set from his own coll<sup>n</sup>. These of Wahlberg's were very int. (Boston 5 Nov. 1842) evering to Dr Booth. He had never seen a Wahlbergian *Carex*. I have looked forward to being able to furnish you with some of these. I shall separate my own specimens the first thing when I get settled. For your kind offer of materials for a (Bras 118) paper with you mention please accept my thanks. I shall try to work hard at something soon, but know not (I travel HERBARIUM) what I shall attempt beyond our Cambridge Catalogue: and beyond study with I most need.

The 20<sup>th</sup> ult<sup>o</sup>, received by Dr. Gray, through I must beg you to allow the unavoidable hurry consequent on leaving home, to be some excuse for the imperfections of these hasty lines. I should not have delayed writing so long, had it not been that my time has been wholly engrossed, since my return from abroad, with — first — going to the White Mts (whether I accomp<sup>d</sup> Dr. Gray who was very successful in obtaining living plants, not to speak of several of the rarer alpine plants as *Calamagrostis*, *Sylvestria*, *Asplenium alpinum* &c) and after that a visit to Schenectady (I brought Aster *Greenii* home with me, wholly new to Gray, who had seen only Greene's spec<sup>ms</sup> & Pickering's — and to Greene almost as much, for he had but a fragment & knew not where he obt<sup>d</sup> it — I found it growing not uncommonly on the Hill where the new college stand<sup>ing</sup>) since which time I have been wholly occupied with the laborious task of packing up, to return to Schenectady. My plants I have not yet been over. This week is my breaking up of my apartments at Cambridge, when I left for Europe — left me on my return wholly without quarters. Like all other town houses, there is not room at my father's — or at least it is too limited for my purpose — did I not much prefer the country. While I was thinking where I should settle down, I was invited by our old & esteemed friend & former Pastor Dr Potter to come on there & see them. He wishes me to undertake the lectures in Botany, and I hoped to have the rest of my time undisturbed for study. The gratification this invitation afforded to those whose wishes I am most bound to respect — led me not to hesitate — though if I consulted my own wishes — I should not think of it for a moment. Still, the place is pleasant & familiar: the

(\*) Oakes, had it in his Herb<sup>um</sup> — but he instantly said he knew it grew in Ipswich & had sent it to you once off not twice. Well the first time we rode out we stumbled on Aster *Greenii*! in Ipswich too.

Three years I spent there in study made me acquainted with the place  
and I have hopes that neither party will regret the thing. At all events  
I am going, and wherever I go, I shall settle for some years — As I am  
most anxious to see everything in order about me once more — and nobody hates  
moving & disorder more than I do. Excuse this, dear Sir, for I could hardly  
lay less. I will now leave it for topics of more importance & interest.  
Dr. Gray's appointment and acceptance are great things for the N. E. Flora.  
I very hope he will get rid of the Zoology, and that the Faculty will  
choose a Professor for that branch. The old "Massachusetts Professorship of  
Nat. Hist<sup>y</sup>", the one Peck held, and the Statutes of which require its  
Professor to be an Entomologist, is still in existence. Let this then be filled,  
with an able man (there is one whose claims are indisputable) and everything  
will be well. I know this will please Dr. Gray for I spoke of it to  
him — I wish it might please those whose will is law in the premises!  
I don't know what we may now now anticipate for our N. E. Botany,  
with such a Head as we have gotten. So long without any, it seems strange  
that all is settled. I know how it has been well. You were our only re-  
source in difficulties — & minor troubles were without a helper. Was an impor-  
tant Florida necessary? It was for one young man to think of it, collect for it,  
& begin it. This work Dr. Gray has embraced heartily. I shall put together  
my materials this winter, I hope, & send my MS to him, when he will write  
new concise descriptions, and finish the work. I did not mean above that  
we had not excellent Botanical friends — patrons, here — but there was nobody  
of real energy and determination, no one willing to be our head. May  
Dr. Gray find every satisfaction & enjoyment & be prospered in all his undertakings  
to revive our Flora. It is not a new one. 30 years before Bigelow's first  
edition of his Flora, in 1844, an Ipswich botanist had determined *Micros-*  
*typhus* and *Comandra* to be new Genera & his elaborate descriptions are still  
in existence in his MS "Descriptions of indigenous American Vegetables". This  
was Dr. Cutter, A. A. S., & the author of a paper on our plants in the first vol.  
of the *Memories of the Amer. Acad.* I have planned to give an account  
of these MSS — which form 12 curious volumes — and are of far  
more interest and value than the pub<sup>d</sup> article. You cannot resist the  
conclusion, in exam<sup>s</sup> these Books, that Cutter was a very scientific and  
accurate Botanist, so far as the means & opportunities of a country minister

in 1785 enabled him to be<sup>2</sup>. But I must tell you a little of my travels.  
I have been most favoured in seeing the eminent botanists of the country I visited.  
It is no trifling matter to have visited Brown & Wahlenberg, Hooker & Fries; and  
to have been acquainted with such men as Borser, and Klotzsch and Boott. I shall  
never forget the kindness of Sir Wm. Hooker. He was most friendly most courteous.  
Indeed had I been distinguished as a naturalist I could not have been received with  
more cordiality. Mr. Webb was very polite in Paris. Dr. Greville is all that is ex-  
cellent and liberal. But I hope at some time to be able to show you the  
notebook of those whom I saw. Dr. von Martius & Zuccarini were very kind  
as was Prof Lehmann, who furnished me with a very large coll<sup>n</sup> of Siberian  
Leguminosae, particularly Astragalus. At Lambert's Sale I acquired one half  
of his old American Herb<sup>m</sup>. This was disposed in 2 Cabinets — the first  
contain<sup>g</sup> all Pursh's plants — and the 2<sup>d</sup> — all the rest (Fraser, Bradley  
Lewis & Clark ~~to~~ Nuttall &c) This last I bought. I purchased also a  
bundle marked on the Catal. only "American Plants", which seems to con-  
sist entirely of Pursh's plants & contains his (Crataegi, Juncei, Canices &c.  
I also acquired the MS of Ph's originally proposed work (vide his pref.) a "Synop-  
sis secundum Persoonium", a MS map of his Routes; a Catalogue of the plants  
he gathered in N. A., & another printed Catal. of a Russian Bot. Gard. by him.  
I have besides Mr. Lambert's own presentation copy of his Flora, with Don's  
on the unlabelled bundles of Ph's Can<sup>a</sup> plants. Among my miscell. lots  
some of Labillardiere's &c. Herb. pl. which were the means of procuring me a  
visit from Mr. Brown & a subsequent present of the Cancei of his Peridromes. My  
visit to Wahlenberg was a very pleasant one. He also was so kind as  
to add to my coll<sup>n</sup> of Cancei all his own pub<sup>d</sup> sp. & many others; as well  
as the Salices Juncei & Geopogon of the St. Lapp. From Mr. Menzies I received  
much kindness & I value especially the coll<sup>n</sup> of N. W. Coast lichens which he gave  
me — one of which is the plant upon which Ach. founded his *Cetraria lacunosa*,  
a wholly distinct plant from what has been called so here. Mr. Parker has  
given my name to the plant of our region; an honour I greatly value. I  
have been most liberally favoured with Lichens, particularly by Dr. Klotzsch  
to whom I owe a very fine set of the duplicates of Fries, Funt, Hume  
old, Sells, &c. I studied 3 weeks most assiduously on the Lichens of the  
Royal Pump<sup>er</sup> Herb<sup>m</sup>. I spent the winter in Berlin. Prof Kunth very  
polite, and I saw him often, and was able to furnish him with a



large no of plants by means of a box which I had sent out during the  
 winter. In Sweden I won a laurel & made a discovery! finding 3 Canices  
 in the region of Gottenburg, which were wholly unknown in the region, omitted both  
 in Wahlberg's & Areschoug's Floras, and one of them even in Wahlberg's  
 Flora Suecica! These were *C. salina*, *maritima*, & *Norvegica* - plants all  
 unmaskably confined to a Scandinavian peninsula in Europe - & there almost  
 confined to Norway & Lapland. It is almost as astonishing as my discovery  
 that two of these most striking species should have escaped Linnaeus too!  
 I found them everywhere desiderata - but have plenty left. This is one



82

College of New Jersey

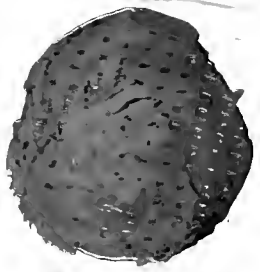
Princeton

N.J.

Prof. Torrey



single

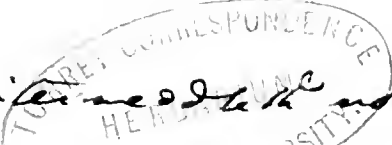


that

so

Prof. Torrey

of those joys of the botanist "with which the stranger will need to be met."  
 I was alone when I made the discovery & determined the plants myself  
 also. It rather astonished the excellent Professor Areschoug - and I almost  
 felt it awkward to tell him of it. But I must tell you now of my  
 adventures; for I hope I have not wearied you with this long & hasty letter  
 I am dear sir most respectfully & sincerely yours  
 Ed. Tuckerman





Cambridge 26/11. 1845

Dear Sir

I was very sorry that I missed seeing you when you were so kind as to call at my rooms. Immediately on my return I hoped to see you at Dr. Gray's but learned from him that you had gone. I have since intended to write - but the hurry of the close of the term has prevented. Again I was so unlucky as not to find you yesterday - when Dr. Gray said you would be at his house.

Compelled now to leave myself - I hasten to thank you for the kind loan of your Junci - which I have left at Dr. Gray's in precisely the order in which I received them. Sorry as I was to have to give them up - I could do no less. I shall look with great interest at whatever may finally



be determined with regard to them.

My Botanical Studies have been interrupted by other studies of late - but I hope to resume them to some extent.

I have taken leave to ask your acceptance of a little book I have written - which I sent with the Juncus.

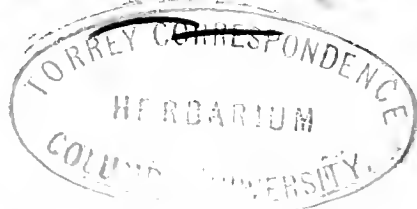
I hope I may have the privilege of telling you more than I can here - in person ere long - and am meanwhile

Mo. resps & truly

Your grateful friend & servant

Edw. Tuckerm.

Prof. Torrey





2  
To Prof. Torrey

Care of Prof. Gray  
Cambridge.



Cambridge 12 Dec. 1847.

Dear Sir

It is so long since I have let down to ask questions of you, that I am afraid you have given me up as recreant to Botany. But I am once more working hard at Lichens, and hope to get out the first number of the "Lichenes Amer. Sept. xficcati" in the course of six weeks. I shall publish 50 — but prepare only 25 copies the present fall. The books will be ready for another season's collection. I have been happy enough to interest some botanists at the South in my undertaking, and mean, if I can, to visit the South myself, in the spring. I hope also to be able, the next season, to explore the different Herbaria, and settle the new Lichens of Muhlenberg, Schweinitz, & Halsey. My foreign collection is very large, and authentic, and gives me great advantage. I shall have great pleasure, soon, in laying before you the first Fasciculus of my work — & hope it will please you.

Dr. Gray's Manual is advancing rapidly. He has just called, and taken the ~~proof~~ copy of my concluding portion of the work — on Lichens. Mr. Sullivan's Mops is all in the press.

But I commenced this letter, in order to ask your judgment, on a point of great interest to me. In my pamphlet on the *Canices*, 1843, I separated what I thought the three species *C. bullata*, *C. cylindrica*, & *C. monile*, adopting for the first the plant so called by all American writers on *Canices* — for the second the plant with Schweinitz's autograph in Hooker's *Herb<sup>m</sup>* — confirmed by another autograph spec<sup>n</sup> in Dewey's *Herb<sup>m</sup>* — and for the 3<sup>d</sup> — the variety *cylindracea* of *replicaria* Dew.

Now Dr. Booth came to the conclusion that the *cylindrica* above mentioned was the true *C. bullata* of ~~Schkuhr~~ Schkuhr — & he therefore was compelled to name anew the *C. bullata* of Amer<sup>n</sup> authors, which he did, calling it *C. Tuckermanni*, with a very kind notice, in his letter, of my separation of the three species.

But Mr. Carey, in Dr. Gray's Manual — though he has come to the same conclusion with Booth — that the *cylindrica* of my pamphlet (sustained by two autograph tickets of Schweinitz) is Schkuhr's *C. bullata* — yet calls the latter *C. cylindrica*, Schwein. without the mention of any new authority for the change.

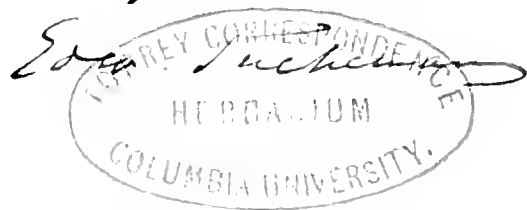
Your Flora was before him, which, if I am not in error, confers (and it must be the original authority if you have Schweinitz's specimens of his plant) my opinion as to the *C. cylindrica* of Schweinitz.

In this position of things I am anxious to obtain from you a settlement of this question — and also of the question — if Schweinitz's *C. cylindrica* is the true *C.*

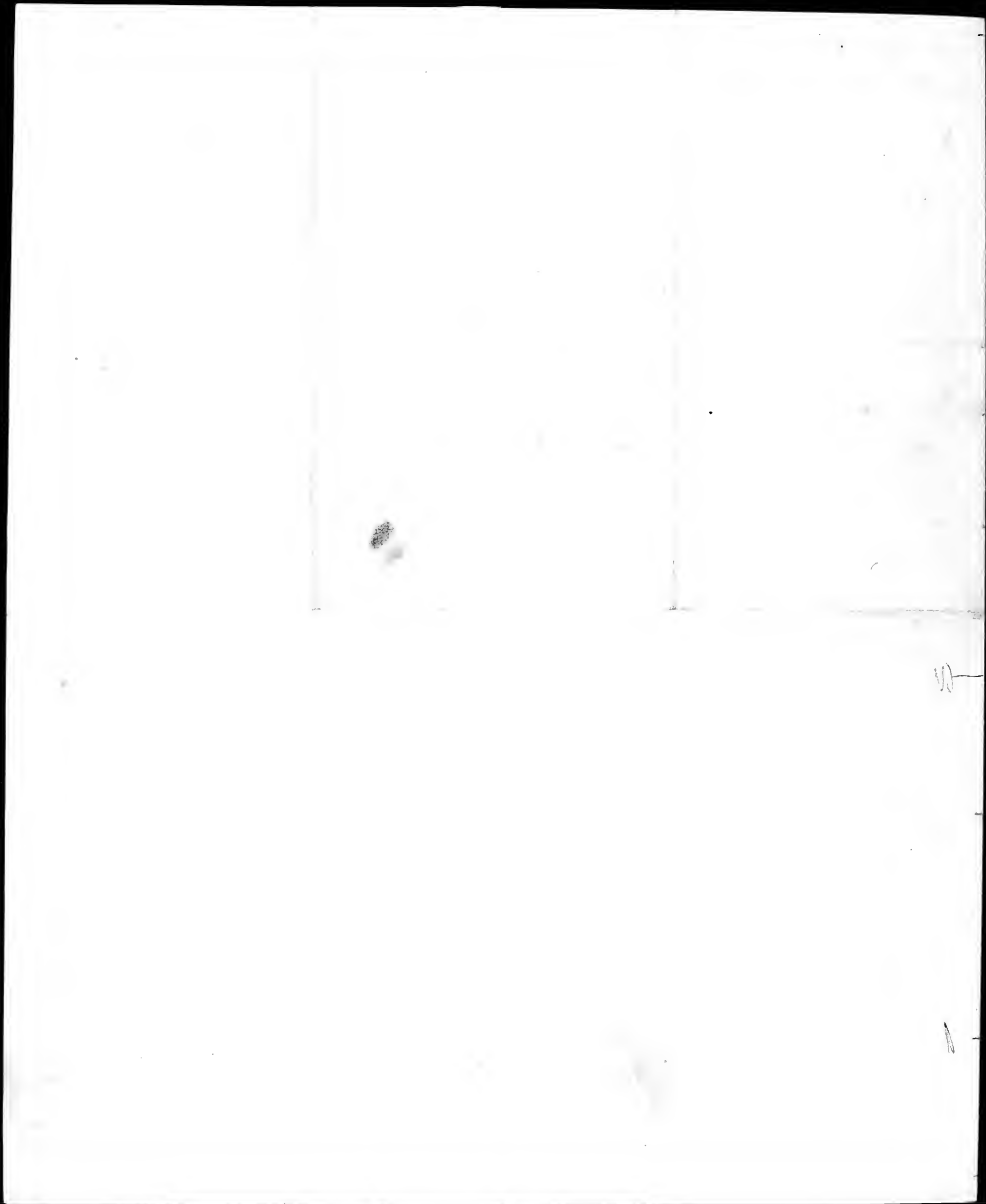
bullata of Schkuher - ought not Booth's name to be adopted for the other plant? I hope it will not put you to any trouble - but I cannot but think you will consider my interest in a question in which I at least suppose myself to be sustained by Schweinitz himself, by you, and by Booth, to be pardonable.

Many thanks for your kind notice of my publication in your great Flora of N. Y. It is these things that encourage botanists, and students of every kind, but they seem to be getting old-fashioned in this new age, and young botanists must shift for themselves, or contend for what they think they have a right to.

Excuse my troubling you with this long letter on so personal a matter - A line will be valued most highly by Yours most respectfully & sincerely



Prof. Torrey  
College of N. Y.  
Purvisston.







Cambridge

23 Oct. 1848.

Dear Sir

Having just returned from the Mountains, where I have stayed about a month and a half, I have first of all put in press the fine Lichens which you so kindly sent me from Capt. Fremont's collections — and which gained much in appearance by the reviving effect of the dampening I gave them — and now write with my thoughts on those other precious collections that you so kindly conferred to entrust to my charge.

I hope the specimen of my way of studying Potamogeton contained in Silliman's Journal meets your approbation. I tried hard

to make the descriptions so full that an opinion could be formed on the proposed species, from the descriptions alone, (allowing for errors) — Is there anything that you noticed that should be altered in the succeeding ones? Excuse me if I commit the not unnatural mistake of supposing every one else interested in what so much interests me. To make up for all, I can promise really handsome sets of specimens of everything that I formally describe.

I hope to continue with another article on Potamogeton immediately — after which I must wait the opportunities of another year. Sir W. Hooker has most kindly informed me of his having selected for me the Potamogeton he has to send. I mentioned your kind suggestion to Mr. Booth, and more generally to Sir William himself — and hope soon to thank you in spirit

once more for what I do not think I should ever have thought of asking for myself.

I cannot but long anxiously for yet more of Fremont's treasures. Should other specimens turn up that you can spare of those already sent, I will promise you they shall go only to the "Lich. Amer. Exsicc.", & whatever is over, shall be returned. I cannot tell how many of those of you sent will be in sufficient number to publish fairly. I fear *Ev. vulpina* will hardly slip through. It is so splendid a thing in California & Oregon, that I had rather husband present stores till more come, than be compelled to put poor specimens in some of the copies to make out the set. I shall know when they come from the press however. The other *Evernia* is, as I fancy, a new sp; with bright yellow shields! I have not looked it up yet, but suspect it may have escaped notice. The *Ramal. retiformis* has suffered greatly. Would that more such Lichens as these might

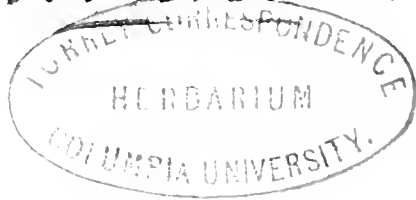
come along. It is refreshing to see them, after wading through the starved species of Santa Fe & all I have yet got from our Southern states.

Sir William Hooper says that Mr. Lowell has purchased all Dr. Taylor's Cryptogamic collections. And here too is Mr. de Crenx with what Agassiz calls the best Mycological herb<sup>m</sup> after Schimper's in Europe! But I fear I weary your patience. Permit me only to ask, in conclusion, if you laid out your own specimens of the Lichens of Fremont. It is my impression that you desired me to do so when I went over them, but as I made no note of it at the time, I am uncertain as to your wishes in this respect. Mo. respt & sincerely yours

Edw. Tuckerm<sup>an</sup>

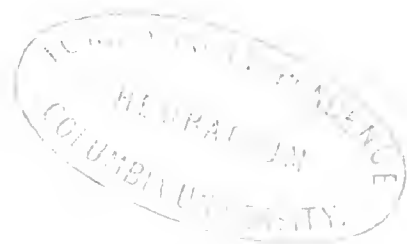
Prof. Torrey -

Princeton, N. J.



Prof. Torrey.

Dear Sir



I herewith return to  
Dr. Gray, who kindly takes charge of them, — the  
Parcels of Lichens and Potamogetons which you  
were so kind as to send me for Examination.

The Lichens I have looked through  
with interest, but did not find any of your spec-  
imens nor of Mr. Halsey's which I had hoped  
to avail myself of in the citations of your Enu-  
meration, & his — the Northern lichens being al-  
most without exceptions from myself.

I was so unfortunate, in examining one of  
the Potamogetons which was glued down, to set  
on fire the edge of the paper, without however  
injuring the specimen at all. As the best reparation  
I can offer for this unfortunate occurrence which  
I deeply regretted — I have put up with the specimen

a parcel containing all the species I am now able to furnish, and including six species (as I regard them) new as species to the herbarium - & all from the Northern States.

I addressed you a letter shortly after the receipt of the specimens, with several inquiries - which I suppose failed to reach you. With the help of Sir W. J. Hooker's Collection, & other investigations of my own, I have been able to satisfy myself in regard to these points; and believe there is nothing of importance remaining to lay before you.

Hoping you will accept the species sent as some amends for the injury & unintentionally occasioned to the specimens - & that you will find the collection in as good order, in other respects, as they were when I received them.

I am with respects

Yours

Edward Fuchsman.

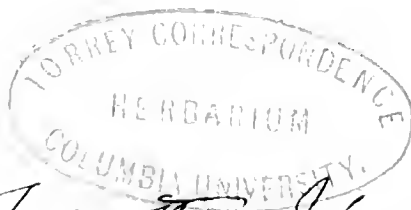
Cambridge

2 Aug. 1829.

Recd? June 17.  
and... 18

Cambridge 14 June 1857

Dear Sir



I had the pleasure to receive your favour accompanying the plants you so kindly remembered me by sending - and hasten to acknowledge what I so highly value. It is the first time I ever fairly saw *Tuckermania* - the only other specimen that ever I had in my hand, being too imperfect to give me a good notion of it. I need not say how glad I am to possess it - and if I can only procure at some day *epi achenia*, I shall have nothing more in the *Phanerogamia* (excluding *Psamoptera*) to wish for.

It was a main object in me in going abroad to shake off a dyspepsy; but German, Swedish & Danish cookery did not expedite the process of recovery at all - and until *Strawberries* came (22<sup>d</sup> June at Gottenburg - we had them after that till 14<sup>th</sup> Aug. in Paris) I was about good for nothing. Six months passed in Berlin, and as many more in other parts of the North of Europe, went by with scarcely anything done, and

P.S. I am sorry to say that your letter all mislaid. This is the first I have received since 1848, or possibly the spring of 1849. May I hope for a copy of the plate of *Tuckermania* in your works?



even at Upsal, I was almost good for nothing at all. The little I accomplished however was there. I had previously sent Fries everything of the slightest interest among my Southern Lichens, and had the great satisfaction to go over the Carolinian, Georgian, & Texan strangers, with the notes & observations, & under the eye of the greatest cryptogamist who ever lived. In Germany I made no new acquaintances among Botanists of any importance - but made pleasant visits to several old and kind friends at Kumpf, Lehmann, Kollt H. - I missed seeing Schow & Vahl at Copenhagen - both being ill. Rather I did see the excellent Vahl, but he was stretched on his back with chronic Rheumatism - one of the fruits of his Greenland labours.

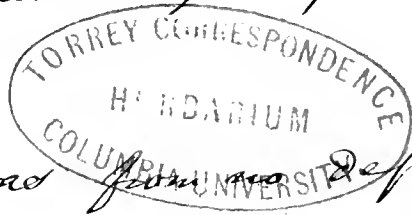
Fries I found in good health. Waplesey still hale & tough as oak, and as kind to me as he was eight years ago. I need not say how delightful my visit at Upsal was. I hope it won't be the last I shall make. Klotzsch at Berlin was in excellent health, and full of his labours. Link was very well too, but has since gone. Munich I had a delightful

interview with me in October; one of the very last interviews  
that any stranger had with him; his melancholy coming on  
soon after, & not leaving him till his sad death. No one  
can go to Germany without wishing to go there again & again.  
English hospitality & French politeness both yield to the  
heartly simplicity of German kindness. That's the only  
word for it. In this I include Danes & Swedes;  
with Germans. In England I saw Sir William & Lady  
Hooker & beside them scarcely anybody but Dr. Booth.  
The fact is the dyspepsia completely deprived me of  
the wish no less than the power to work; not to men-  
tion that I had constant and sole charge of a party  
of ladies during almost every week of my absence.

I have got together my materials for an "Enum-  
eration of the Lichens of the Southern States, and prepared  
the manuscript, which now waits of the slow process of  
describing the new species, which are legion. Since I got  
back, I have also put up, unassisted, the remaining  
25 copies of my *Exsiccata* vol I., no trifling job — I con-  
sider these proofs that my travels have not been  
without good effect. They have found no errors in  
the *Exsiccata* so far. There are differences of opinion of  
course in some species. This holds to his genus *Pyrene*,  
(as Montagne does also) according to me to *Parmelia* — and Fries

advises me to refer our northern "*Cetr. juniperina*" (*C. juniperina* v. *viridescens* Tuckerm. Syn.) rather to *C. Pinastri* of which it will form an interesting low-country form - which I entirely agree in - having ventured myself to refer some of my own specimens to *C. Pinastri* years ago. But such criticisms as these (which are all Fier made) do not affect the value of the work in the least. The difficulties lay in the *Cladonia*, which are all unquestioned. I have material ready for about four fasciculi, making two volumes more, but cannot tell now when I can fit down to it, or even look up anybody else to attend to it. Meanwhile, thank to you (for the Texan bundle, sent sometime since, no less than all your beautiful Californians - *Ramalina Menziesii* Taylor, (the reticulate one;) *Evernia xanthocarpa* Tuckerm. mos. (the large black filamentous one like *Evernia jubata*) *E. valpinia*, H.K.) and many most excellent Southern comesp.<sup>s</sup>, my store increases. I am well equipped with Carolina lichen; have many Georgian; a large box of Louisianians not yet examined; some Floridians; and a world of Texans; beside Santa Fe, California N. I shall limit my studies henceforth to Lichen & the Potamogetons - If I extend beyond the last *Phanero-* *gamia*, it will be only in a monographical way; for I cannot pretend any longer to try to keep up with general Botany. I am living in my own house at length, and hope I may sometime have the great pleasure to see you in it. With great respect  
I am truly yours  
Edw. Tuckerm.

Cambridge 22 June 1857



Dear Sir

It was ~~from~~ <sup>my</sup> deficiency in interest that I looked so carelessly at the Lichens you were kind enough to send me. But it has been the result of my experience that I could best satisfy myself in studying plants, when I gave myself up to a particular group exclusively. This has got to be my fixed habit now; and as I cannot devote the whole time to Botany, I lay aside everything that comes till enough accumulates for three or four weeks' work, and then go into it when the time comes with all my strength. Still I glanced <sup>or meant to</sup> at every specimen you sent, and had it not been at night, should by no means have missed the *Roccella*, as I did. You did not express your desire that I should ~~express~~ give an opinion (immediately) upon them, and so I laid them aside, to be worked up when the time should arrive, with the other things in the same predicament (including a Box of goodly ware from Louisiana, and the lost precious remittance of W. Wright, kindly forwarded by you.)

The *Roccella* is a treasure. At p. 13 of my Synopsis I mentioned all that I knew relating to the genus as profusely North American. But even with the chance there indicated, I am sure I had very little expectation of its turning up on our Atlantic coast. San Diego gives it to us; thereby an interesting additional genus to our Flora. The specimens are branches only & do not enable me to determine the habit - but the flattened form refers it to *R. fuciformis*. It does not much resemble (in these specimens at least) the *R. fuciformis* of the East Indies, or of Europe. It is perhaps

more like some of my specimens from Peru, and at  
these last are infertile - or ~~para~~ rather sterile & it may be  
that fertile ones wd come nearer yet to the Californians.  
Still I sh<sup>d</sup> be glad to see spec<sup>s</sup> with the base of attach-  
ment perfect. As Enchociler will allow but one species  
throughout the globe (his *Parmelia Roccella*) though I do not  
suppose his authority is to be implicitly followed in any case, however  
glad I may be to study his observations - and as Fries in-  
clines strongly to the same course with the two old species,  
and does reduce the intermediate *R. phycopsis* - while he speaks  
of no other - it would be extremely venture some, with  
these specimens only, to do more than put them, (differences  
disregarded) with the other flattened forms under *R. fuciformis*,  
as one of the five-branched forms, analogous to common similar  
ones of the terete *R. tinctoria*. The little fibrillose *Parmelia*  
is *P. erinacea*, Ach. sub Borrera, described by him from specimens  
communicated by Menzies, with other sp. of the specimens I  
have compared it. It is very near *P. ciliaris*!

The few Californian lichens that are known seem to  
promise a good deal of novelty in the lichen vegetation  
of that region. I notice three divisions of interesting lichens  
from California. 1<sup>st</sup> The wholly distinct & new form is a Ramal.  
*Menziesii* Tayl. (wh. I called <sup>*synopsis*</sup> *R. retiformis*, following at  
I thought I should do, Menzies's own name) 2<sup>d</sup> The  
forms resembling Eastern ones, but ennobled, and strikingly  
distinct in peculiar features; as *Evernia xanthocarpa*, wh  
with <sup>apparently</sup> the vegetation of a gigantic *E. jubata*, has apo-  
thecia with a yellow disk. 3<sup>d</sup>, Old species in ennobled  
forms, as *Evernia vulpina*, with its very fine and  
radiated apothecia. To which of these groups the  
above two lichens belong, I do not feel wholly certain;  
but if *Parm. erinacea* be a species, I hope some other  
characters will be ~~given~~ <sup>found</sup> ~~in them~~ found than what depend  
mainly on the quantity, length, or even position of the fibrillae,  
though Fries lays some stress apparently on the last feature, when  
casually referring to the plant. If you desire it, I will  
gladly make out a list of whatever you have sent me,  
from time to time, & include in it Menzies's, of wh. he  
gave me a good set - but at present such a list would give

a very satisfactory <sup>view</sup> of the Lichens Veget of California.

I was truly happy to receive the seeds of Tuckermmania. I had almost concluded that the plant was forgotten, for I could never procure a specimen, till you sent it, and could not bear that any body had it in cultivation. Thanks to you for it, and for the promise of the Plates. I shall contrive to get a sight of the whole book here beside; but particularly desire for myself only the Tuck<sup>er</sup>, as I have never studied a single Calif<sup>a</sup> plant (Shenog). You sent me a large stock of Calif<sup>a</sup> lichens - particularly Ramal-Meuricii, Evernia vulpina, and E. xanthocarpa. They will be published in my Lich. Exsicc<sup>ta</sup>, which I know is the disposition you w<sup>d</sup> approve. Of the R. Meuricii I have a very large coll<sup>ctn</sup> but can only cke out perfect specimens for the Exsicc., by piecing together branches, and am particularly poor in fertile branches. A few more therefore will be highly acceptable, sh<sup>d</sup> you receive them. As to Evernia vulpina, I wish to put first-rate spec<sup>s</sup> of the fine fruit in every one of the 50 copies, and want some 20 more specimens, at least to do it. Of the 3<sup>d</sup> E. xanthocarpa I have magnificent specimens, but only a very few fertile, & not more than a third of what I need infertile. I do not hesitate to mention these deficiencies, because such a work of mine is no private concern at all, and may I know depend on the sympathy & approb<sup>n</sup> of Botanists, which you have so abundantly manifested.

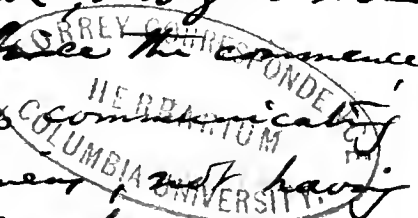
Speaking of Botanists in my last, I ought to have said, that nobody I knew seemed to have altered at all during the 8 years of my absence from them. Wahlenberg I looked at with real interest and reverence. He went through his Potamogetons with me, just as he did with his <sup>& Willows</sup> Canes in 1842, and gave me the fullest sets of every species &



variety - and no other herb is so rich in the curious &  
often new Lapland Potamogetons. Unluckily I lost the  
parcel between Upsal & Stockholm - but Friis promises  
to make it good. Wahlenberg is an old bachelor, and  
has, altogether the prettiest, pleasantest official residence  
in the most charming connexion with the garden - that  
I have seen. They say he lives on roast beef, & milk;  
& I heard in Upsal that he told his class lately  
that he did not see who could set a limit to the endurance  
of a good constitution, kept up by the simple & temperate  
course to which he adhered. Friis was not so well as  
usual last winter, but I found him in excellent health,  
just at the close of the term, & looking forward to a  
thorough overhaul of his immense stores, preparatory to  
the promised 2<sup>d</sup> edition of the Lichenographia. He  
wished me to remain some months, but had as the  
ladies of my party made it impossible, the Swedish  
diet would have put it out of my power, for the  
art of cooking flesh is unknown in Sweden. (That "roast  
beef" of Wahlenberg's was a Swedish statement, and no doubt  
Wahlenberg has herculean powers of digestion.) Kunze and  
Lehmann I found as well and hearty - Lehmann  
better indeed than when I left Germany before. At  
Berlin I made the acquaintance of a young Botanist,  
Dr. Jessen (Jessen) who will I am sure be heard from.  
He is just now devoted to microscopical Algae, but  
is generally a botanist of real science, & geniality as  
well as genius. But I am wearying you with  
this prolixity. I hope I have freed myself  
from the imputation of carelessness as to the lichens -  
which I did not value the less, for not having  
at the moment examined them. I shall be happy  
to hear from the gentleman you mention, & to give him  
any assistance in my power; though, since the commence-  
ment of my *Explicata* I have given up communicating  
more than remarks in return for specimens, not having  
time to put up the latter, as a general rule.

I am very respectfully yr.

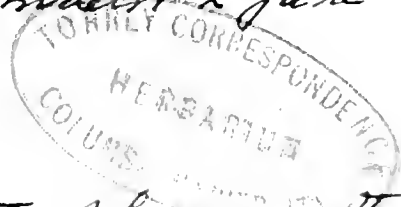
+ I consider this as handsome a return as I can make.





Recd June 6th

Amherst 2 June 1856



Dear Sir

It was with great pleasure that I recognised the direction of your kind enclosure, and examined its contents. I wish I had been able to send you two volumes instead of one; but the 3<sup>rd</sup>, or 5<sup>th</sup> or 6<sup>th</sup> Forciculi, which I had hoped to get out at the same time with the 2<sup>nd</sup>, and for which both the books and the specimens are ready — still wait, till I can get time for the labour of putting down the 7500 lichens which, or about which, will be required.

I am glad however that the precious specimens collected by Col. Fremont are at length made available to the botanical world in a form of which I am confident you will approve. It is very singular that the remarkable *Ramalina Menziesii* should have remained undescribed from 1789 when Menzies collected it, till 1847 when Dr. Taylor published his description. Nothing will give me greater pleasure than to receive collections from California and Oregon. The country which is distinguished by such trees as Sequoia &c must have other curious lichens, I am inclined to think, beside the *Ramalina*, and

the new *Eucomia* to which I have attached the name  
of its distinguished discoverer, and I shall gladly receive  
& where possible publish in the *Exsiccata*, all the  
species which you may be able to procure for me.  
Will you let me add that if any additional  
expense be caused by these collections, I shall  
be glad to be permitted to bear it. It must  
be long before the Lichens of our vast Floras  
are fully settled - but the more northern Section  
will be for the easiest to bring into good sci-  
entific order - and there are more easy not  
merely in structure, but in the abundance of au-  
thorities which we possess to illustrate them. I  
hope to bring out sometime within the present  
year a succinct enumeration of North-American  
lichens to include the whole of North-America,  
with descriptions of the many new species which  
are in my herbarium - entirely for the use  
of lichenists however, and only preparatory to a  
future work which must contain microscopical  
characters derived from the asci & sporidia. This  
last, if I am able, I hope to do what I can to-  
wards, in a gradual way, by some serial publication.

I have not seen Koenig's work. When I was in Lon-  
don in 1850 I asked Mr. Pamplin to look out for every-  
thing which appeared upon Lichens & send it to me, but  
I fancy he is not in the way of doing such things -  
and my library is deficient at present in several  
of the new books. But the tendency of the new  
school is not encouraging. There is no single author,  
of the standing of Fries or Montagne among them,  
and they appear to be bringing the science back (by  
a too great confidence in the microscopical appearance  
differences, & the distinctions which they assume to rest on  
these) to that chaos which Fries extricated it from 25  
years ago. I am inclined therefore to extreme caution  
in my study of the microscopical structure, and to  
consider the characters derivable from it as always requir-  
ing a full support from all the other characters of the  
plant. And this caution is the more important, doubt-  
less in myself, as I am not one of those who are na-  
turally inclined to investigations with the microscope.



I have just had a letter from Fries, & he expresses  
an ardent desire to receive plants from California  
and Oregon, and if you will send me such a col-  
lection as you can spare of the species of those regions  
and also of any of the <sup>extreme</sup> Southern & Southwestern states

which he <sup>also</sup> mentions as the regions in which he is most  
deficient, it will give me real pleasure to send  
them to him, and him, I am sure, to know  
to whom he is indebted for them.

I do not think I know anything of Mr Wright's  
New Mexican Lichens. Certainly I have connected any  
specimens received from him (not the collector!) wholly  
with Texas. It will then be very interesting to  
examine your Suite, and also the other specimens  
of your herbarium; and I should be glad to do so  
as soon as you will let me, as I can then  
incorporate them with my new Enumeration. Fend-  
ler made a small collection about Santa Fe, which  
I received, and which was remarkable for its gen-  
eral Northern rather than Southern character.

I hope to send Fries a collection of Lichens for  
his son who proposes a Monography of Stereocaulon,  
quite soon, that is within six months - and shall  
be very happy to add to it as much as you will  
enable me to. He has now all my herbarium,  
so he wishes to make the Upsala collection <sup>good</sup>  
as may be in <sup>North</sup> American plants.

Let me thank you once more for this new proof  
of your kind regards, & subscribe myself

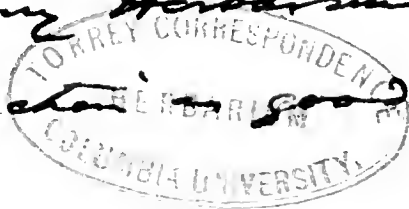
Most respectfully & sincerely yours

EDW. TUCKERMAN

To Prof. Torrey

Enclosed a b. of Cenogonium Ehrh.  
New Zealand Lichen

(List of Lichens, I used in Whipple's List)



Amherst 3 July 1856  
CORRESPONDENCE  
HERBARIUM  
COLUMBIA UNIVERSITY.

Dear Sir

I believe I can give you a fuller account of the lichen from the sands near "Inscription rock", which you kindly sent me the other day. I called it a variety (terrestris) of *Parmelia conspersa*, and I still do not think that a very strange opinion: though microscopical examination will be required to establish it.

But there is figured in Swartz's rare "*Lichens Americani*" Fasc. I., Nurnib. 1811, (of which I never saw any copy but my own, & will therefore take leave to add that both the letter-press, as well as certainly the figures are by Achardus, & that there was no more of the work published) a *Parmelia congruens*, Ach., of which it is said "incolit arbores America borealis. In Nova Anglia obscurata". — Of this lichen I have hitherto failed to get any information either here or in Europe. In my Synopsis of Lichens of New England, &c I put it among that group of *Parmelia* which

include *P. stellatus*, (*Physcia*, Fr.) and Acharius compares it (in his *Lichenographia*) with a species of that group.

I find however that I possess a bit of a specimen from Floerke's collection, which is ticketed "*Contreclatka, Tilesius*" and named "*P. congruus*, Ach.", which is certainly the same with the lichen from Inscription rock - & with this light I am also satisfied that the description of Acharius is also sufficiently accordant with your specimen - far more so indeed than his cited figure - by which alone I could not possibly have determined our lichen.

The name will therefore be *P. congruus*, Ach. Syn. p. 204; but it is to be noted that Acharius's plant is said to inhabit trees, while your specimen, as for the earth, and Dr. Hayden's from Nebraska also - except that he adds one bit apparently of the same, but still more like states of *P. conspersa*, from rocks, from which also Tilesius's lichen was derived.

*P. congruus* does not seem to be known at all to lichenists of this day - and I fear it would not

be distinguished, except as a new variety of  
*P. conspersa*. The latter is unknown upon  
trees in Europe - but I have what I  
cannot distinguish from it from the Cypress  
of Mississippi or Louisiana.

I have also wished for some time to  
correct the statement in my note that  
I did not see Mr. Wright's lichen from  
New Mexico. I suppose I have them,  
but that they are ticketed only "Exp"  
from Texas to N. Mexico".

I remain

Mo. respect & truly yours

Edw. Tuckerman



To Professor Torrey  
New York.





and Iris.



What an honour ~~it is~~ able  
to make out such a list of  
persons to whom one may  
send. I do not expect to  
do anything more at Botany  
except continue my study of  
Lichens. + therefore I am  
the more anxious to find to  
try one whose politeness or whose  
kindness I have to acknowledge.

I am sorry Dr. Torrey has still  
left my letter unnoticed - as  
well as my book - but I have  
no doubt he has reasons for it  
though I cannot imagine what  
they are. I shall ask him myself  
how he does before long. I am  
in my old room at all times.

I have got one copy of my  
riches - ready :

Very resp<sup>l</sup> & truly yr

Edw. Tuckerman

Prof. Gray,  
Cambridge.

W. S.

If I am entitled to

the Proceedings of the Academy, and  
suppose, I can consider me an ap-  
plicant for it regularly, I have  
only rec<sup>d</sup> two no's, I think I  
have an astronomical friend for  
whom I wish to procure it, or one  
for my own collection.